CONSTRUCTION NEWS

Supplement to ENGINEERING NEWS. New York, January 4, 1906.

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CONSTRUCTION NEWS.

PLANS AND SPECIFICATIONS ON FILE.

The following Plans (P.), Specifications (S.), and Bidding Sheets (B. S.) may be seen at the office of The Engineering News Publishing Co., 220 Broadway, New York:

Bids close.	Work.	Place.	On file.	See issue.
Jan.				
*4	Garbage crem't'y	Lexington, Ky.	S.	11-30
6	Caisson	Charleston, S. C.	S.	12-14
*8	Dredging	Jacksonville, Fla.	S.	12 21
11	Water mains	Bismarck, N. B.	P. & S.	12-21
*12	Sewer system	Manila	P. & S.	9-21
*15	Dump scow	Wilmington, N. C.	P. & S.	12-21
*15	Girder bridge	Cameron, Ill.	P. & S.	12-28
*15	Irrigation canal	Billings, Mont.	P. & S.	12- 7
*15	Pumping engines	Albany, N.Y.	P. & S.	12-21
*15	Water-works	Lincoln, Neb.	S.	12-28
16	Pipe sewers	Boston, Mass.	S.	11-23
*19	Bridge substrctre	Salem, Mass.	P. & S.	12-28
*19	Bdge superstrctre	Salem, Mass.	P. & S.	12-28
*19	Bridge	Salem, Mass.	P. & S.	12-28
20	Dredging	Guantanamo, Cuba	S.	12-21
*23	Boiler house	Philadelphia, Pa.	P. & S.	12-28
Apr.				
*2	Port works	Chile	P. & S.	5- 4
5	Wharves	Manila, P. I.	P. & S.	12-14

*Work advertised in Engineering News.

NOTE—We are desirous of securing specifications and bidding sheets (and plans when not too bulky) of pending work for file in our New York office for the benefit of contractors or others who may be interested in the work. If more sets than one are sent us we shall be pleased to distribute these to contractors who ask for them. When the work is advertised in Engineering News a note that the plans are filed with us will be added to the advertisement without cost.

LIST OF CONTRACTS PENDING.

Bids close. Work. Place. See issue.

LIGHT, HEAT AND POWER PLANTS.

Jan. 5. Electric wiring, Washington, D .C. ..... Dec. 7
Jan. 5. Park lighting, Milwaukee, Wis. ..... Dec. 7
Jan. 15. Electric light plant, Argenta, Ark. ..... Dec. 21
Advertised, Eng. News, Dec. 21 to Jan. 4.
Feb. 1. Power house, West Point, N. Y. ..... Jan. 4
Advertised, Eng. News, Jan. 4 to 25.
No date. Gas plant, Mains, Elkader, Ia. ..... Dec. 14

BRIDGES.

Jan. 4. Bridges, Salem, Mass. ..... Dec. 7
Jan. 5. Bridges, Vermillion, S. Dak. ..... Dec. 21
Jan. 8. Bridge, Akron, O. ..... Dec. 21
Jan. 8. Culvert, Alhambra, Cal. ..... Jan. 4
Jan. 9. Steel bridge, Chattanooga, Tenn. ..... Dec. 7
Advertised, Eng. News, Dec. 7 and 14.
Jan. 9. Bridges, Brookings, S. Dak. ..... Dec. 14
Jan. 10. Bridges, Lexington, Neb. ..... Dec. 28
Jan. 10. Bridges, Lexington, Neb. ..... Dec. 28
Jan. 11. Bridge, Houston, Tex. ..... Jan. 4
Jan. 15. Bridges, Minneapolis, Minn. ..... Jan. 4
Jan. 15. Bridge, Cameron, Ill. ..... Dec. 28
Advertised, Eng. News, Dec. 28.
Jan. 16. Bridge, Waupaca, Wis. ..... Jan. 4
Jan. 17. Bridge, Tradelake, Wis. ..... Jan. 4
Jan. 19. Substructure, Salem, Mass. ..... Dec. 28
Advertised, Eng. News, Dec. 28 and Jan. 4.
Jan. 19. Superstructure, Salem, Mass. ..... Dec. 28
Advertised, Eng. News, Dec. 28 and Jan. 4.
Jan. 23. Bridge, Belgium ..... Nov. 2

BUILDINGS.

Jan. 4. Post-office, Natchitoches, La. ..... Nov. 16
Advertised, Eng. News, Nov. 16 and 23.
Jan. 4. Library, Bloomington, Ind. ..... Nov. 23
Advertised, Eng. News, Nov. 23.
Jan. 4. Building, Natchitoches, La. ..... Dec. 28
Jan. 4. Building, Macon, Ga. ..... Dec. 28
Jan. 5. Electric systems, Washington, D. C. ..... Dec. 7
Advertised, Eng. News, Dec. 7 to Jan. 11.
Jan. 5. Heating system, etc., Washington, D. C. ..... Dec. 7
Advertised, Eng. News, Dec. 7 to Jan. 11.
Jan. 5. Heating, etc., Washington, D. C. ..... Nov. 30
Jan. 5. Elevators, Washington, D. C. ..... Dec. 14
Advertised, Eng. News, Dec. 14 to 28.
Jan. 5. Steam heating, Laramine, Wyo. ..... Dec. 14
Advertised, Eng. News, Dec. 14 and 21.
Jan. 8. Glazing, etc., Washington, D. C. ..... Dec. 14
Advertised, Eng. News, Dec. 14 to Jan. 4.
Jan. 8. School, Brooklyn, N. Y. ..... Dec. 28
Jan. 8. Heating & ventilating, New York, N. Y. Dec. 28
Jan. 8. Cottages and barn, Jackson, Fla. ..... Dec. 28
Jan. 8. Court-house, Jasper, Ala. ..... Jan. 4
Jan. 9. Buildings, National Military Home, Kan. Dec. 28
Jan. 9. Building, Cincinnati, O. ..... Dec. 21
Jan. 10. Buildings, Fort Robinson, Neb. ..... Dec. 28
Jan. 10. Post-office, Reno, Nev. ..... Nov. 16
Jan. 11. Fire station, Delaware City, Del. ..... Dec. 21
Advertised, Eng. News, Dec. 21 to Jan. 4.
Jan. 11. Building additions, New York, N. Y. ..... Jan. 4
Jan. 15. Mill, Laurel, Miss. ..... Jan. 4
Jan. 15. Elevators, Brooklyn, N. Y. ..... Jan. 4
Jan. 15. Heating, New York, N. Y. ..... Jan. 4
Jan. 15. Plumbing, New York, N. Y. ..... Jan. 4
Jan. 15. School, Brooklyn, N. Y. ..... Jan. 4
Jan. 15. School, New York, N. Y. ..... Jan. 4
Jan. 15. Building, So. McAlester, Ind. T. ..... Nov. 23
Jan. 15. Blacksmith shop, etc., Oglethorpe, Ga. ..... Dec. 28
Jan. 16. City hall, Newark, N. J. ..... Dec. 21
Jan. 17. Cut stone, Washington, D. C. ..... Dec. 28
Jan. 26. Jail, Jacksonville, Fla. ..... Dec. 28
Jan. 20. Church, La Crosse, Wis. ..... Jan. 4
Jan. 26. Plumbing, heating, etc., Fort Logan H. Roots, Ark. ..... Jan. 4
Jan. 26. Shelter, Fort Morgan, Ala. ..... Jan. 4
Jan. 31. School, Bancroft, Neb. ..... Jan. 4
Jan. 31. Library plans, Toronto, Ont. ..... Nov. 23
Feb. 1. Library, Edgerton, Wis. ..... Dec. 21
Feb. 5. Heating and Plumbing, Logan, Ia. ..... Jan. 4
Feb. 6. Steel sheds, New Orleans, La. ..... Jan. 4
Feb. 6. Officers' quarters, Chelsea, Mass. ..... Jan. 4
Feb. 9. Building, Ames, Ia. ..... Jan. 4

WATER SUPPLY AND IRRIGATION.

Jan. 6. Water-works, Gallup, N. Mex. ..... Jan. 4
Jan. 9. Water-works, Macon, Miss. ..... Dec. 21
Jan. 10. Water-works, Osceola, Ark. ..... Dec. 28
Jan. 12. Water-works, Minneapolis, Minn. ..... Dec. 28
Jan. 12. Pipes, hydrants, etc., Dufur, Ore. ..... Dec. 28
Jan. 15. Pumping engine, Lincoln, Neb. ..... Dec. 14
Jan. 15. Water-works equipment, Argenta, Ark. Dec. 21
Advertised, Eng. News, Dec. 21 to Jan. 4.
Jan. 15. Pumping engines, Albany, N Y. ..... Dec. 21
Advertised, Eng. News, Dec. 21 and Jan. 4.
Jan. 15. Cisterns, Key West, Fla. ..... Dec. 21
Jan. 15. Irrigation canal, Billings, Mont. ..... Dec. 7
Advertised, Eng. News, Dec. 7 to 18.
Jan. 15. Water and sewer system, Parral, Mex. ..... Dec. 14
Advertised, Eng. News, Dec. 14.
Jan. 16. Tank and trestle, Seattle, Wash. ..... Dec. 28
Jan. 19. Water-works supplies, St. Louis, Mo. ..... Dec. 28
Jan. 22. Turbine pump, Winnipeg, Man. ..... Jan. 4
Advertised, Eng. News, Jan. 4 and 11.
Jan. 30. Pumping station, Cincinnati, O. ..... Jan. 4
Feb. 6. Water system, Greeley, Colo. ..... Jan. 4
Advertised, Eng. News, Jan. 4 and 11.
Feb. 15. Water-works, De Queen, Ark. ..... Jan. 4
Advertised, Eng. News, Jan. 4.

The Advertisers in Engineering News

are prepared to submit bids for furnishing the machinery, tools or equipment for any work, no matter what the size, or where located.

The **Engineers, Technical Experts** and **Contractors** who advertise in Engineering News are also in a position to submit plans and estimates for construction work. When you want work done quickly and well place yourself in correspondence with our advertisers.

No date. Water meters, Delphi, Ind. ..... Dec. 7
Advertised, Eng. News, Dec. 7.
No date. Water-works, etc., Zionsville, Ind. ..... Dec. 21

SEWERAGE.

Jan. 4. Sewer, Washington, Ia. ..... Dec. 21
Jan. 9. Sewer, Cincinnati, O. ..... Dec. 21
Jan. 9. Sewers, New York, N. Y. ..... Jan. 4
Jan. 12. Sewer system, Philippines ..... Sept. 21
Advertised, Eng. News.
Jan. 15. Trunk sewer, Washington, D. C. ..... Dec. 14
Advertised, Eng. News, Dec. 14 and 21.
Jan. 15. Sewer system, Texarkana, Ark. ..... Dec. 21
Jan. 15. Sewers, Kelso, Wash. ..... Jan. 4
Jan. 23. Sewers, Atlantic, Ia. ..... Jan. 4
Advertised, Eng. News, Jan. 4.
Jan. 25. Sewer system, Lexington, N. C. ..... Jan. 4
Advertised, Eng. News, Jan. 4 to 18.
Jan. 25. Sewer system, Gainesville, Fla. ..... Jan. 4
Advertised, Eng. News, Jan. 4 to 18.
Feb. 1. Sewer system, St. Johns, Ore. ..... Dec. 21
Feb. 15. Storm sewer system, Dayton, O. ..... Jan. 4

STREETS AND ROADS.

Jan. 4. Road, Bloomington, Ind. ..... Dec. 28
Jan. 5. Grading, Vermillion, S. Dak. ..... Dec. 28
Jan. 8. Paving, Jersey City, N. J. ..... Jan. 4
Jan. 9. Paving, grading, New York, N. Y. ..... Jan. 4
Jan. 9. Paving, Shreveport, La. ..... Jan. 4
Jan. 10. Paving, Little Rock, Ark. ..... Jan. 4
Jan. 10. Roads, Valparaiso, Ind. ..... Jan. 4
Jan. 10. Road, Cleveland, O. ..... Dec. 28
Jan. 13. Paving, Cleveland, O. ..... Jan. 4
Jan. 13. Grading, Cleveland, O. ..... Jan. 4
Jan. 13. Roads, Knox, Ind. ..... Dec. 28
No date. Paving material, Lynchburg, Va. ..... Dec. 14
Advertised, Eng. News, Dec. 14.

MISCELLANEOUS CONTRACTS.

Jan. 6. Caisson, Charleston, S. C. ..... Dec. 14
Jan. 4. Garbage crematory, Lexington, Ky. ..... Nov. 30
Advertised, Eng. News, Nov. 30 to Dec. 28.
Jan. 5. Stone wall, New York, N. Y. ..... Dec. 28
Jan. 7. Roadway construction, C., C. & St. L. Ry ..... Dec. 28
Advertised, Eng. News, Dec. 28.)
Jan. 8. Copper wire, Panama ..... Jan. 4
Jan. 8. Bulkhead, Los Angeles, Cal. ..... Jan. 4
Jan. 9. Tunnel, Boston, Mass. ..... Dec. 28
Jan. 9. Wharf work, New Zealand ..... Nov. 2
Jan. 8. Dredging, Jacksonville, Fla. ..... Dec. 14
Advertised, Eng. News, Dec. 14 to Jan. 18.
Jan. 8. Garbage crematory, Fort Barrancas, Fla. Dec. 14
Jan. 8. Wharf, Ft. Monroe, Va. ..... Dec. 21
Jan. 9. Naval supplies, Washington, D. C. ..... Dec. 21
Jan. 9. Machine tools, Washington, D. C. ..... Dec. 14
Jan. 10. Drain, Boone, Ia. ..... Jan. 4
Jan. 11. Drainage, Pekin, Ill. ..... Jan. 4
Jan. 11. Supplies, Washington, D. C. ..... Dec. 28
Jan. 12. Dredging, New York, N. Y. ..... Dec. 28
Advertised, Eng. News, Dec. 28 and Jan. 4.
Jan. 12. Ditch work, Glencoe, Minn. ..... Nov. 30
Jan. 12. Gantry crane, Panama ..... Jan. 4
Jan. 13. Ditches, Cleveland, O. ..... Jan. 4
Jan. 13. Garbage disposal plant, Racine, Wis. ..... Dec. 28
Jan. 15. Excavation, Buffalo, N. Y. ..... Dec. 7
Advertised, Eng. News, Dec. 7 to 14.
Jan. 15. Scow, Wilmington, N. C. ..... Dec. 21
Advertised, Eng. News, Dec. 21 to Jan. 11.
Jan. 15. Steel pipe, Natal (Foreign) ..... Jan. 4
Jan. 16. Naval supplies, Cuba ..... Jan. 4
Jan. 17. Drainage ditch, Ft. Dodge, Ia. ..... Dec. 28
Jan. 20. Railways, Philippine Islands ..... Dec. 28
Jan. 20. Dredging, Guantanamo, Cuba ..... Dec. 21
Jan. 24. Vessel, Washington, D. C. ..... Jan. 4
Jan. 29. Plants, etc., Atlantic Coast Line ..... Jan. 4
Advertised, Eng. News, Jan. 4 to 18.
Jan. 30. Ingots, spelter, Italy (Foreign) ..... Jan. 4
Jan. 31. Tunnel, Guanapuato, Mex. ..... Dec. 14
Feb. 1. Canals, Roswell, N. Mex. ..... Dec. 28
Advertised, Eng. News, Dec. 28 to Jan. 18.
Feb. 1. Dam, Boise, Idaho ..... Jan. 4
Advertised, Eng. News, Jan. 4 to 25.
Feb. 5. Drain, Iowa City, Ia. ..... Jan. 4
Feb. 6. Steel sheds, New Orleans, La. ..... Dec. 28
Advertised, Eng. News, Dec. 28 and Jan. 4.
Feb. 8. Drainage ditch, Sioux City, Ia. ..... Jan. 4
Feb. 10. Breakwaters, etc., Egypt (Foreign) ..... Jan. 4
Feb. 13. Steel tower, Shreveport, La. ..... Dec. 28
Advertised, Eng. News, Dec. 28 to Feb. 8.
Feb. 15. Locks and dams, Dallas, Tex. ..... Jan. 4
Advertised, Eng. News, Jan. 4 to 18 and Feb. 8.
Apr. 5. Wharves, Manila, P. I. ..... Dec. 14
Apr. 2. Port works, Chile ..... May 4
Advertised, Eng. News, May 4, 1905 to Apr. 1, 1906.
May 1. Steel dock, Chile ..... Nov. 9
No date. Filling, Far Rockaway, N. Y. ..... Dec. 14
Advertised, Eng. News, Dec. 14.
No date. Railroad grading, etc., Tidewater Ry. Dec. 14
Advertised, Eng. News, Dec. 14 to 28.

RAILWAYS.

The names of parties awarded contracts are printed in capital letters.

ATLANTIC COAST LINE.—Bids are asked until noon, Jan. 29, for grading, sewerage, water supply, brick and steel buildings and all other work in connection with constructing new locomotive works and car shops at Waycross, Ga., except machinery and equipment. Plant will include a roundhouse, oil house, storehouse, machine and erecting shop, blacksmith shop, coach shop, paint shop, planing mill, foundry, pattern storehouse, dry kiln and frame freight car repair shop. Proposals submitted are to cover plant complete, except machinery and equipment. R. E. Smith, Gen. Supt. Motive Power, Wilmington, N. C. (Advertised, Engineering News.)

BEAUFORT & WESTERN.—The GENERAL CONTRACTING & ENGINEERING CO., 15 Whitehall St., New York City, has a contract for building this line from Morehead City to Beaufort, N. C., three miles.

BALTIMORE & OHIO.—At a recent meeting of the board of directors it was decided to four-track the line from Pittsburg, Pa., to Connellsville, a distance of 58 miles, it is reported.

BRANDON, SASKATCHEWAN & HUDSON'S BAY.—This company has completed track laying on its proposed road from Devil's Lake, N. Dak., to the international boundary. It is said that work is to be continued on the balance of the road to Hudson's Bay if the weather permits.

CHESAPEAKE & OHIO.—G. W. Stevens, Pres., at Richmond, Va., has announced that "during the next year the C. & O. will receive 6,000 new freight cars, ten passenger coaches and 36 heavy consolidated freight engines. There will be 50 miles of road double-tracked during 1906, making double track from Clifton Forge, Va., to a point near Russell, Ky. We are also going to build a 31-mile branch from Covington, Va., to some iron ore properties in this region," according to Wall St. Journal, New York.

CHARLESTON, PARKERSBURG & WESTERN.—Company has been chartered to develop the Bruen coal lands north of Charleston, W. Va. Line has been located for eight miles from Charleston. When completed road will make a short route west and north. A. S. Alexander is Pres.; C. P. Peyton, vice-Pres. and Gen. Mgr.; Edward M. Craig, Secy. and Treas.; W. S. Laidley is Statutory Attorney. Others on the board are R. B. Cassiday and F. M. Staunton, of Charleston, and Alexander J. Bruen, 49 Wall St., New York City.

CENTRAL ILLINOIS.—An extension may be built from Taylorville to Paris, Ill. The present line between Pawnee and Auburn, Ill., nine miles, will be improved during 1906. A. H. Stone, Pawnee, Ill., is Engr.

CHICAGO, MILWAUKEE & ST. PAUL OF MONTANA.—Incorporated in Montana to build the Montana section of the Chicago, Milwaukee & St. Paul extension from Evarts, N. Dak., to Seattle and Tacoma, Wash. Capital stock, $2,000,000. Incorporators: E. D. Sewell, of Indianapolis, Minn.; Charles E. Varnum and J. R. Dickinson, of Chicago; and George F. Shelton and P. H. Scanlan, of Butte, Mont.

CHICAGO, ROCK ISLAND & PACIFIC.—According to a press report of an interview with the President, B. L. Winchell, about $6,800,000 will be expended on physical improvements of the system during 1906. This amount does not include the cost of the new equipment. Among the improvements will be the installation for 100 miles of the most approved system of automatic electric block signals. It is planned to extend this system of signals at the rate of about 100 miles annually as a substitute for the manual and other systems now in use. During the year the road will reballast with rock 600 miles of track on various divisions, and will lay 85-lb. steel rails on 300 miles of track. This will complete the laying of heavy rails between Chicago and Colorado and between Chicago and Kansas City. The line from Davenport to Kansas City, known as the Missouri Division, is being completely rejuvenated. New 85-lb. steel rails are being laid the entire distance of 140 miles. More than half of this line has been entirely reballasted with rock. All the light bridges have been replaced with steel structures, designed to meet the requirements. The work on the Brighton cut-off is being pushed. The cut-off will be ten miles in length and will reduce the main line distance by three miles.

CHESTERFIELD & LANCASTER.—A contract has been given by this company to O. H. PAGE & SON, of Cheraw, S. C., for building its road from Ruby, S. C., west to Lynches River, a distance of 18 miles. Noted last week.

CENTRAL RY. OF GEORGIA.—Improvements to cost about $50,000 will be undertaken at the company's yards at Albany, Ga. H. M. Steele is Ch. Engr., at Savannah, Ga.

DELAWARE & HUDSON.—It is reported that this company may build an extension from South Wilkesbarre to Yatesville, Pa.

DENVER, NORTHWESTERN & PACIFIC.—H. A. Sumner, Ch. Engr. Denver, Colo., states that track was laid during 1905 from Arrow to Sulphur Springs, Colo., 33 miles, and that work is now under way from Sulphur Springs to McCoy's, 47 miles. The distance from McCoys to Salt Lake City, to which point it is proposed to build, is 392 miles. G. R. Simmons is Purchasing Agent, at Denver.

DUBLIN & REDSTONE.—It is reported that a charter has been granted to this company in Pennsylvania to build a railroad for a distance of about ten miles, to open up coke fields controlled by W. J. Rainey in Menallen and Redstone Townships, Fayette County. Capital, $200,000.

DELAWARE, LACKAWANNA & WESTERN.—According to local press report the work of eliminating grade crossings on Morris & Essex division at Newark, and the Oranges, N. J., which has been under way for three years, will be completed within the next few days. This work has cost about $3,000,000. In the course of the changes the tracks had to be elevated at some points, but the work was in depressing them just beyond Newark, where a cut over a mile long had to be constructed. Here the railroad is carried under the old Morris & Essex canal, which was the most difficult part of the undertaking.

DENVER & RIO GRANDE.—The 25-mile extension to the western end of this company's line has been authorized by C. H. Schlacks, Vice-Pres., at Denver, Colo. E. J. Yard is Ch. Engr.

GULF, SANTA FE & NORTHWESTERN.—It is said that this company, which was incorporated some months ago in the interests of the Atchison, Topeka & Santa Fe to build a line from Texico to Brownwood, Tex., 310 miles, with a branch from Canyon City to Plainview, has finished the location for the branch line, which will be 58 miles in length, and grading is to begin at once. The construction of the main line from Texico, where connection will be made with the Eastern Railway of New Mexico, to Brownwood will not be undertaken at present.

GRAND TRUNK PACIFIC.—Charles M. Hays, Pres., Montreal, Que., has announced the selection of Tuck's Inlet and Kaicus Island, about 30 miles south of Port Simpson, B. C., as the Pacific Coast terminals of the Grand Trunk Pacific.

GEORGIA, FLORIDA & ALABAMA.—We are advised that no definite decision has been made regarding the 65-mile extension from Cuthbert to Columbus, Ga., via Benevolence, Lumpkin, Louvale and Jamestown. Company probably will begin work this year. J. P. Williams is Pres., at Savannah, Ga., and P. L. Stacker is Ch. Engr., at Bainbridge, Ga.

GULF & NORTH WESTERN.—We are informed that the main line is now being surveyed from Waco to Strawn, Tex. Right-of-way is being secured. No contracts have been awarded yet for construction. Contract may be let for the 40 miles from Waco to Meridian as soon as survey is completed. The line is to be 225 miles long, extending from Waco to Meridian, Stephenville to Strawn, Meridian to Weatherford and Meridian to Hamilton. Main line will be about 125 miles long; one branch about 65 miles and the other about 40 miles. W. M. Knight, of Fort Worth, Tex., is Pres.; N. R. Morgan, Meridian, Tex., is Secy. and P. A. McCarthy, of Lufkin, Tex., is Ch. Engr.

JASPER & EASTERN.—The contract for building a branch from Whiskeychito Creek to Oakdale, La., 23 miles, has been awarded to LANTRY & SHARP, of Kansas City, Mo. The road, which is being built by the Santa Fe, is now under construction from Kirbyville, Tex., via De Ridder, La., to Whiskeychito Creek, a distance of 53 miles. The charter calls for an extension of the main line from Whiskeychito Creek to Alexandria. M. F. Temple, Kirbyville, Tex., is Ch. Engr.

KENTUCKY & TENNESSEE RY.—Specifications are on file at office of Engineering News for pole ties and cross ties which are desired by this company. J. E. Butler is Supt., at Stearns, Ky.

MIDLAND CENTRAL.—Incorporated in Nebraska to build a railroad from Spalding, Greeley County, through Greeley, Wheeler, Holt, Rock and Keya Paha Counties. It will be part of the Union Pacific System. Incorporators: E. L. Myers, C. M. Thompson, C. A. Ripley, C. E. Lear and Lyman Waterman. The principal place of business will be Newport, Rock County, Neb.

NORTH COAST.—According to a press report, James A. Kerr, Atty. for this company, at Seattle, Wash., has stated that this line "is a part of the Pacific Coast division of a transcontinental line that intends to make Seattle its terminus. We will have within less than a year 100 miles of road constructed out of Seattle and we have already acquired by purchase title to right-of-way for a distance of 120 miles." He has announced that the North Coast Co. has $25,000,000 secured for the construction of the system from Walla Walla to Seattle, Wash. Amended articles of incorporation, increasing the capitalization of the company from $1,000,000 to $25,000,000 have been sent to Olympia for filing, and grading work has already been commenced in eastern Washington.

PLANT CITY, ARCADIA & GULF.—F. A. Wheeler, Plant City, Fla., Ch. Engr., states that this road has been extended this year from Keysville to Welcome, Fla., three miles, and that it is to be extended from Welcome to Arcadia, 47 miles.

PENNSYLVANIA R. R.—This company has filed articles in New Jersey incorporating the Pennsylvania & Newark R. R. Co., with $500,000 capital stock. New company will construct a 47-mile line from Trenton, N. J., to a point near Elizabeth. The incorporators named are A. J. Cassatt, William A. Patton, Samuel Rea, Thomas D. Cuyler, W. H. Barnes, Henry Tatnall and S. L. Shephard, of the Pennsylvania.

SHREVEPORT NORTHEASTERN.—T. J. Hardeman, Ch. Engr., Homer, La., informs us that surveys are completed from Shreveport to Homer via Meriden and right-of-way is secured; 18 miles are almost graded. Contract has been let to A. KINNEBREW & CO., of Homer. A. K. Clingman, Homer, is Pres. The line will be 250 miles in length, extending from Shreveport to Homer and other towns and northeasterly to Memphis, Tenn. Capital is arranged for construction.

TEXAS.—The state will build a railroad six miles long from the William Clemens convict plantation to connect with the St. Louis, Brownsville & Mexico R. R. in Brazoria County. John L. Wortham, Austin, Tex., is financial agent of state penitentiary system.

TEXAS CENTRAL.—Charles Hamilton, Vice-Pres. and Gen. Mgr., Waco, Tex., states that surveys are now being made for an extension from Stamford, Tex., west about 45 miles.

ELECTRIC RAILWAYS.

The names of parties awarded contracts are printed in capital letters.

BURLINGTON, VT.—A company will be chartered, under the title of the Champlain Valley Electric Ry. Co., to build through Burlington, Shelburne, Charlotte, Ferrisburg, Vergennes, Panton, Addison, Bridgeport, Shoreham and Orwell, with an ultimate terminal at Rutland.

BRATTLEBORO, VT.—Plans are under way to construct an electric railroad from Brattleboro, Vt., to Northfield, Mass., via Hinsdale, N. H. Capitalists are said to have secured an option on a large amount of the stock of the Brattleboro Street Ry. Co., and the Brattleboro Gas Co., and they propose to construct the line the coming season. The road will run from Brattleboro to Hinsdale, thence to Greenfield, and from there to Northfield. C. K. Jones is Gen. Mgr., of the Brattleboro Ry.

BUFFALO, N. Y.—The Board of Aldermen has granted a 50-year franchise to the International Ry. Co., for 6½ miles of streets in East Buffalo. T. W. Wilson is Gen. Mgr., Ellicott Sq., Buffalo.

MADISON, N. Y.—At a recent meeting of the town board an application for a franchise for an electric railway presented by Thomas F. McBride as trustee of the promoters was granted. William C. McAdam, of Utica; Thomas F. McBride and F. K. Baxter, the engineer, appeared for the promoters. As proposed, the line will run from Clinton to Hamilton, via the Madison reservoir route, or via Blouckville and Pecksport. It is understood that the necessary private right-of-way for the 25-mile road has almost been secured, and that work will begin early in the spring. Noted on Nov. 16.

NEWARK, N. J.—Local press reports state that the Pennsylvania R. R. Co. will own and operate the proposed high-speed electric railway between Newark and New York City. As was noted last week in Engineering News the Public Service Corporation, through its subsidiary company designated as the Interstate Tunnel Railway Co., of New Jersey, has completed its plan for the proposed rapid transit route between Park Pl., Newark, and Chambers St., New York, and will commence work on the new line as soon as the working plans are perfected by the engineering department. A change of route of "branch one," the New Jersey end of the Hudson River and Jersey City end of the tunnel and tunnel approach, has been filed in the office of the secretary of State at Trenton. The change covers an addition to the length of "branch one" of 6,046 ft. This line is to run through the tunnel under the Hudson River now being constructed by William G. McAdoo, 11 Broadway, New York. Previously noted.

WASHINGTON, PA—New companies will be incorporated to be known as the Coal Center Electric Co.; West Middletown Electric Co.; Washington & Brownsville St. Ry. Co., and the Washington & Independence St. Ry. Co., to construct a trolley line from Coal Center up the Monongahela River to Brownsville and follow the old National Pike through Washington to West Middletown and Independence and then across the West Virginia state line to Bethany and Wellsburg. Surveys are being made. It is said that as soon as they are finished the work of construction will be begun. Pittsburg capitalists are the promoters.

HAGERSTOWN, MD.—The Blue Ridge Ry. Co. has been incorporated by J. M. Woolff, of Waynesboro, Pa.; Wm. L. Minick, of Chambersburg, Pa.; H. H. Keedy, Jr., and J. Clarence Lane, of Hagerstown, Md., for the purpose of building about 1½ miles of trolley road in Maryland when the Chambersburg, Greencastle & Waynesboro Trolley Co., builds its extension from Pen-Mar to Monterey.

EASTON, MD.—A company will be organized to build an electric railway from Easton to Trappe, Md., and the Cambridge ferry, and possibly to Centreville and Chestertown, Md. The promoters who are reported interested are Charles B. Lloyd, Alfred Kemp and Charles Simpson, of Trappe, George W. Wilson and Gen. Joseph B. Seth, of Easton.

MIDDLEBOURNE, W. VA.—The Middlebourne & Ohio River Railway Co., has been chartered to build an electric railroad from Middlebourne, in Tyler County, to the Ohio River. Capital stock $25,000. Incorporators, V. B. Archer, C. L. Williams, C. T. Hiteshew, T. J. Anderson, and B. S. Pope, all of Parkersburg, W. Va.

ASHEVILLE, N. C.—Coxe Bros., of Asheville, plan to build an electric railway between this city and Greenville, S. C.

BILOXI, MISS.—J. H. Neville, Gulfport, Miss., is interested in construction of an electric railway from Biloxi to Ocean Springs.

COLUMBUS, MISS.—The Columbus Construction Co., owner of the franchise for electric street railway line here, has resumed work on its line and expects to have about 3½ miles in operation by April 1. Most of the equipment is purchased. H. W. Hall, New Decatur, Ala., is Engr.-in-Charge of the electrical equipment. Charles L. Wood, of Columbus, Miss., is Roadway Engr.

LOUISVILLE, KY.—Thomas J. Minary, Pres. of the Louisville Railway Co., is reported to have stated that this road will be extended to Shelbyville.

CHATTANOOGA, TENN.—S. W. Divine, of this city, who is promoting an interurban electric railway, has secured necessary financial backing for the railway and it is now reported that construction may be undertaken early this month. The line will pass through Chickamauga Park and extend to Ringgold.

MEMPHIS, TENN.—The Memphis Street Railway Co. has filed an amendment to its charter, increasing its capital stock from $500,000 to $5,000,000 and permitting the company to build new extensions and routes under the provisions of the charter granted to the Memphis Street Railroad Extension Co., a corporation owned and controlled by the Memphis Street Railway Co., but operating under a separate franchise. The incorporators are: W. R. Mallory, W. R. [illegible]gers, Henry P. Dart, T. H. Tutwiler, W. [illegible] Brockway, T. M. Meiklehan, John H. W[illegible]kins, E. R. Vreeland, W. B. Yereance, J. [illegible] Pepper and J. H. Thompson.

EAST LIVERPOOL, O.—Surveys are completed and right-of-way is obtained for the East Liverpool Traction & Light Co., which will build a 32-mile electric line from East Liverpool to Wellsville, O., and Chester, W. Va. Capital is secured. The contract has been awarded to the EXCAVATING & CONSTRUCTION CO., of East Liverpool. The Westinghouse-Church-Kerr Co., 10 Bridge St., New York, is Engr. V[illegible] Ely, of Buffalo, N. Y., is Pres.

WOOSTER, O.—Pugh & [illegible]ard, Civil Engrs., Real Estate Trust B[illegible], Philadelphia, are making preliminary surveys for a trolley line from Wooster to Mansfield, a distance of 40 miles. Work will begin on the road in the spring.

SOUTH BEND, IND.—We are advised that the Chicago, Lake Shore & South Bend Railway Co., which is being promoted by Cleveland people, has placed a contract for building the line from South Bend, Ind., to Chicago, Ill., with JOHN R. LEE & CO., 5 Nassau St., New York. The Chicago, Lake Shore & South Bend Ry. Co., is capitalized at $12,000,000; $6,000,000 of the capitalization being five per cent bonds and $6,000,000 stock. The line will run directly in an air line from South Bend to Chicago, passing through Michigan City and other towns along the route. Very desirable franchises have been secured in all the cities through which the line passes, and a very advantageous terminal contract has been entered into with the Illinois Central Railroad for operating the cars of the Chicago, Lake Shore & South Bend Ry. Co., from Kensington to Randolph St. Station, Chicago, in connection with the suburban trains of the Illinois Central Railroad. Work is now under way and it is expected that it will be vigorously prosecuted from this time on. J. B. Hanna is Pres.; F. B. Wagner, Vice-Pres., and F. C. McMillin, Secy. and Treas., all of Cleveland, O. The Transit Finance Co., 5 Nassau St., New York, has charge of the financial arrangements.

GRAND RAPIDS, MICH.—The Lamont, Titusville & Grand Rapids Construction Co. has been organized for the purpose of doing the preliminary work toward securing an electric line between Lamont, Mich., and Titusville. All right-of-way between Lamont and Titusville has been secured, it is reported. The company, it is said, does not intend to operate the road, or even lay rails, but will simply put the roadbed in condition for the construction work. The company is capitalized at $10,000. Colon C. Lilly is Pres.; Willard F. Walling, Vice-Pres.; B. Rice, Secy.; Wilber Stoddard, Treas.; John Burdick, William S. Nichols, Edward Sherwood, John Scanlon and Herman Olker, are directors, all of Lamont, Mich.

INDIANOLA, IA.—William Wilcoxen, of Des Moines, Ia., representing the Indianola Interurban Ry. Co., has been granted a franchise for an interurban system. The franchise will be voted upon at a special public election on Jan. 30.

MOUNTAIN HOME, ARK.—The Mountain Home & White River Traction Co. has been chartered to build an interurban railway from Mountain Home to a connection of the Big Creek and White River. Capital stock $25,000, of which $15,000 has been subscribed. The officers are John L. Geghan, of Yellville, Pres.; W. L. Marshall, of Mountain Home, Vice-Pres.; G. P. Gregerson, of Mountain Home, Secy. and Treas.

DENVER, COLO.—W. A. Tunis, Pres. of the recently chartered Denver Southeastern Ry., according to a newspaper report, has stated that this company proposes to build an electric line from Denver to Colorado Springs, Colo., 78 miles, via Platte Canyon, Castle Rock, Palmer Lake and Manitou. Surveys have been made from Denver to Platte Canyon, 20 miles. H. O. Tunis is Ch. Engr., and I. C. Cockey, Secy. and Treas., both at Denver, Colo.

EVERETT, WASH.—The Seattle-Issaquah Traction & Coal Co. has been incorporated by W. H. Goldson, P. J. Farley, John McQuade, E. S. Gill and others, to build and operate an electric railway from Renton northward in the general direction of Everett. The company is incorporated for $3,500,000. The line as planned runs to Issaquah from Renton, then northward into Snohomish County, and is designed, besides carrying passenger and other traffic, to carry the output of the Issaquah mines, which the company has purchased, to Everett.

TROUT LAKE, WASH.—H. G. Peets, of Pasadena, Cal., is interested in a company capitalized at $50,000, which will build an electric railway from White Salmon to Trout Lake. Power will be developed on the White Salmon River.

CENTRALIA, WASH.—The Centralia, Chehalis & Eastern Ry. & Power Co. will commence construction on its line about April 1, we are advised. Frank Scott, Box 300, Centralia, is Pres. No contracts are awarded. Most of the right-of-way is secured.

SNOHOMISH, WASH.—We are informed by C. A. Barron, Gen. Agt., of the Snohomish Valley Ry. Co., that the line will be 71 miles in length and will extend from Everett to Snohomish, Monroe, Cherry Valley, Novelty, Tait, Falls City, Issaquah and Renton. Surveys are completed and most of the right-of-way purchased. More than half of the right-of-way is cleared. Bids for construction will be received in March. Bonds are on the market now. The Chicago Title & Trust Co., Chicago, is acting as trustee. G. M. Cochran is Pres.; E. Colburn, Vice-Pres.; E. L. Colburn, Secy.; E. Colburn, Ch. Engr., all at Snohomish. Capital stock is $750,000, fully paid in. Prospectus and plan are on file at office of Engineering News, New York.

LEWISTON, IDAHO. — The Lewiston & Southeastern Electric Ry. Co. will build an extension from Nez Perce and Ilo. Col. Judson Spofford is Pres. and Gen. Mgr., at Lewiston.

LIGHT AND POWER PLANTS.

The names of parties awarded contracts are printed in capital letters.

FALL RIVER, MASS.—A Manufacturers' Committee, composed of Robert I. Gammel, Joseph E. Fletcher and Arnold B. Chace is interested in the project to construct reservoirs along the tributaries of the Blackstone River from Providence, R. I., to Woonsocket. The water stored in these reservoirs would be used for development of power for manufacturing purposes.

NIAGARA FALLS, N. Y.—It is said that the entire capacity of the Niagara, Lockport & Ontario Power Co. that is being built between the Niagara River and Syracuse has been contracted for, and that another line and second set of towers will be built along the present right-of-way. Robert E. Drake is Managing Director, at Rochester, N. Y.

WEST POINT, N. Y.—Bids are asked by Quartermaster, West Point, N. Y., until noon, Feb. 1, for constructing power house. (Advertised, Engineering News.)

NEW YORK, N. Y.—The GENERAL ELECTRIC CO., of Schenectady, N. Y., it is reported, has been awarded a contract by the New York Edison Co. for the largest order ever placed by an electric lighting company in the United States for sub-station apparatus. The contract calls for the entire switchboard equipment for additions that will distribute over 20,000 HP., and the entire cable equipment for extending and increasing the lighting service of the Edison Company in New York City. The cable is to be used underground and is mostly of the high insulation type suitable for high voltages. In all, over 225,000 ft., or 60 miles of cables, are included in the order. The amount involved is nearly $1,250,000. The General Electric Co.'s portion of the equipment will cost about $825,000.

NIAGARA FALLS, N. Y.—It is reported that the Pittsburg Reduction Co., of this city, has awarded contract to the NIAGARA FALLS HYDRAULIC POWER & MFG. CO. for 27,000 HP. to operate a new reduction plant, beginning January, 1907.

CAMDEN, N. J.—J. S. ROGERS CO., Stanwick, N. J., has been awarded the contract for an addition to the Public Service Corporation's power-house at Camden.

LINCOLN, PA.—Lincoln University may erect a central steam-heating plant.

HOMESTEAD, PA.—Council has awarded a contract to the ALLEGHENY COUNTY LIGHT CO. for one year for lighting borough streets, at $75 a light.

HAVRE DE GRACE, MD.—The town council is reported to have granted to Grant Richwine a franchise to establish a gas plant and lay gas mains at this place.

WASHINGTON, D. C.—F. G. Atkinson, Arch., 1116 F St., N. W., is preparing plans for a power-house at Takoma Park, D. C., for the Seventh Day Adventists.

PENNSBORO, W. VA.—The Hope Electric Co. has been chartered to construct and equip electric light plants. Capital, $5,000. Incorporators: M. K. Duty, C. H. Broadwater, T. E. Clovis, Floyd Giebell, A. C. Giebell and W. M. Cowell, all of Pennsboro.

MASSILLON, O.—New bids will be advertised for lighting the city with electricity. Two bids were received recently and rejected as being excessive.

CINCINNATI, O.—It is said that natural gas will be introduced in Cincinnati within the next 12 months, according to the terms of an ordinance passed by the council on Dec. 26, when a 25-year franchise was given to the Cincinnati Gas & Electric Co. The stipulated price is 50 cts. per 1,000 ft.

MICHIGAN CITY, IND.—The Michigan City Light & Power Co. has been incorporated with $150,000 capital. Robert F. Garrettson is interested.

KOKOMO, IND.—Justice James DeHaven, of Kokomo, is promoting a company to build a dam in Wild Cat Creek to secure electric light and power for the city.

JASPER, IND.—City may establish a municipal lighting plant.

AURORA, IND.—The Indiana Public Service Co., recently incorporated, will erect a light and heat plant in this city. David J. Haus is Pres.

MONTGOMERY, IND.—C. W. Slinkard, of Jeffersonville, Ind., will erect an electric lighting plant at Montgomery.

PORT HURON, MICH.—A Detroit press report states that the St. Clair Tunnel Co., after nearly three years' experimenting and negotiating, has let the contract to install a complete electric equipment to operate trains in the tunnel. The plant will cost $680,000. This contract includes the building of a large power-house at each end of the tunnel. Another report has it that F. H. McGuigan, Fourth Vice-Pres. of the Grand Trunk Ry. Co., has denied the report that this road has entered into a contract for equipping the St. Clair tunnel with electricity. A number of concerns have been asked to figure on the proposition, but up to date none have come up to specification.

PETOSKEY, MICH.—The Petoskey & Bay Shore Gas Co. has been incorporated with a capital stock of $140,000. Geo. E. Brackett, of Petoskey, will be Pres.

GRAND DETOUR, ILL.—Senator C. H. Hughes, of Dixon, Ill., and Spencer B. Newberry, of Sandusky, O., have been granted permission to develop the power of Rock River at Grand Detour.

MARSHALL, ILL.—A franchise has been granted to Duff & McClintock here to furnish and manufacture gas for lighting and heat for this city.

DIXON, ILL.—Henry C. Higgins, of Dixon, has purchased valuable water power right at Dixon for $26,000. Electric power for Dixon will be generated.

LOVILIA, IA.—A gas plant will be erected here. A franchise has been voted.

ST. PAUL, MINN.—The West Side Power, Heat & Light Co., with $50,000 capital, has been incorporated to build a plant with a capacity of 3,000 HP. to supply the plants on the west side with electric light and power. The incorporators are A. B. Stickney, Oliver Crosby and R. C. Wight. R. C. Wight will be Pres. and Treas.; Oliver Crosby, vice-Pres.; and G. F. Phileo, Secy.

MINNEAPOLIS, MINN.—The Water Board has directed Andrew Rinker, City Engr., to prepare plans for converting the water power owned by the city into electric light. This is valued at $12,000 a year.

ST. CLOUD, MINN.—The council has passed an ordinance providing for the erection of the proposed new gas plant here.

CLAY CENTER, KAN.—A new power plant for this city is being discussed. I. R. Watts was appointed Chn. of the committee in charge.

DAVID CITY, NEB.—Phillip J. Haas, of York, Pa., has been granted a franchise to install a gas plant in David City, Neb.

ABERDEEN, S. DAK.—Charles E. Pillsbury, of St. Paul, Minn., Electrical Engr., is looking over the ground here for the proposed new lighting plant.

LUFKIN, TEX.—McCarthy, Starnes & Co. has petitioned city council for permission to build and operate an electric light plant.

PROSSER, WASH.—The county commissioners have granted a franchise to the Prosser Falls Land & Power Co. to erect a power line along the county road to the western county boundary line for the purpose of transmitting electric power to Sunnyside for lighting that city, and also to furnish its power with which to pump water for the town. John Chisholm is Supt.

ARLINGTON, WASH.—Thomas Moran, J. T. Moran and T. A. Hansen have filed articles of incorporation of the Jim Creek Water, Light & Power Co. Capital stock is $40,000, all of which is fully paid in. The purpose of the corporation is to furnish water, light and power for the town of Arlington and vicinity. Company will harness Jim Creek Falls, six miles above Arlington. The new company has purchased the present light and water system from Meseher & Crippen, the original owners, and expects to very materially increase the same.

WEST SEATTLE, WASH.—KILBOURNE & CLARK, of Seattle, were recently awarded the contract to install the municipal lighting plant here, at $7,882.

GEORGETOWN, COLO.—The East Argentine Mining Co. will build a big electrical power plant, near Kremmling, within two miles of the Denver, Northwestern & Pacific Ry. The management has secured a total of 3,781,000 cu. ft. of water. Engineer F. A. Maxwell is making final surveys. A force will be soon put to work building the dam, it is said. This dam will be capable of holding 3,871,000 cu. ft. of water, but if the new surveys are followed the capacity will be increased to 4,000,000 cu. ft. According to Mr. Maxwell the company will secure 4,000 HP. The water will be taken from the Grand River, and it is the purpose of the East Argentine Mining Co. to enter the electrical field of both Summit and Lake Counties. An effort will be made to secure a franchise from Leadville, Colo., for wires through city streets. The estimated cost of building the dam, constructing necessary buildings and the purchase of machinery is from $100,000 to $125,000.

GILROY, CAL.—A contract for constructing an electric lighting plant has been awarded to the TRACY ENGINEERING CO., at $7,944.

McMINNVILLE, ORE.—City will soon commence the construction of a municipal lighting plant to cost $75,000.

MURPHY, CAL.—We are advised that the Stanislaus Electric Power Co. has successfully financed the project to build a large hydro-electric enterprise in California. The project includes the construction of a power plant on the middle fork of the Stanislaus River at Subletts Crossing, about six miles from Murphy, Calaveras County, and the establishment of storage reservoirs at the head waters of the river; a diverting dam near Sand Bar Flat in Tuolumne County; a flume and ditch system 15½ miles long, with a capacity of 300 cu. ft. of water per second; a large equalizing reservoir above the power-house site; a system of pipe lines, which will deliver the water to the power-house under a head of 1,500 ft.; a power station, equipped with water wheels and electrical apparatus of a capacity of 20,000 KW.; and a transmission system which will provide for the distribution of power to a market within a radius of 150 miles of the power-house. A pressure pipe system will also deliver water across the Stanislaus River canyon for distribution in Calaveras County. The proposition is backed by strong interests in Boston, Chicago, New York and San Francisco. Tucker, Anthony & Co., of Boston; Frederick L. Eldridge, First Vice-Pres. of the Knickerbocker Trust Co.; and C. C. Cuyler, of Cuyler, Morgan & Co., of New York, are syndicate managers. The Knickerbocker Trust Co., of New York City, is the Trustee for the bond issue, which is to be $10,000,000. The engineering and construction work is to be in charge of Sanderson & Porter, 52 William St., New York City. The water rights, reservoir sites, timber land and other properties have been acquired by the Stanislaus Electric Power Co. from Beach Thompson, of San Francisco, Cal., who will be associated with the enterprise. H. P. Veeder and James K. Moffitt, of San Francisco, Cal., and Harvey P. Goodman, of Napa, Cal., are also interested.

BRIDGES.

The names of parties awarded contracts are printed in capital letters.

SALEM, MASS.—Plans and specifications for the superstructure and sub-structure for the bridge at Salem, Mass, are on file at the office of Engineering News, 220 Broadway, New York. Bids are asked until Jan. 19, as advertised in Engineering News.

BUFFALO, N. Y.—Plans have been completed for the Bailey Ave. bridge here. E. B. Guthrie is City Engr.

ITHACA, N. Y.—The contract for erecting the iron bridge for Campbell Bros. & Co. across Cascadilla Creek was awarded to the GROTON BRIDGE CO., Groton, N. Y.

NEW YORK, N. Y.—The contract for the construction of steel bridges for the New York, Westchester & Boston Railway Co. has been awarded by T. D. Rhodes, of the City & County Contract Co., 30 Broad St., New York, to the TERRY & TENCH CO., of 131st St. and Lexington Ave., New York City.

PERTH AMBOY, N. J.—The contracts for erecting the new iron drawbridge over the Raritan River between Perth Amboy and South Amboy for the New York & Long Branch Railroad Co. were awarded as follows: McMULLEN & McDERMOTT, of Philadelphia, Pa., have contract for substructure, and the PENNSYLVANIA STEEL CO., of Philadelphia, Pa., has contract for metal work and machinery. The new bridge will have double tracks, and will consist of 17 deck plate girder spans on masonry piers. The work will involve an expenditure of $1,000,000.

PEDRICKTOWN, N. J.—The Gloucester County Freeholders contemplate the erection of a new bridge at this place to replace the one recently washed away.

OAKVILLE, PA.—Bids were opened by the County Commissioners for the construction of bridge over the Loyalahanna River at this place as follows: American Bridge Co., 42 Broadway, New York, $19,985; Pennsylvania Bridge Co., Beaver Falls, Pa., $23,580; York Bridge Co., York, Pa., $25,000.

BALTIMORE, MD.—Plans have been completed for the construction of a new steel bridge over North Ave. at the Walbrook station of the Western Maryland Railroad Co.

ODESSA, DEL.—The plans of the Buchanan Bridge Co. have been adopted for the construction of the bridge over the Appaquinimink River at this place.

SOUTH QUAY, VA.—It is reported that a new steel draw bridge is planned to cross the Blackwater River here. Supervisor Vaughan, of Southampton, Va., is interested.

CHARLESTON, S. C.—Plans have been approved for the erection of steel substructures for both the pier bridges at the United States Custom House wharves here. Capt. John H. Devereux, Washington, D. C., is Arch.

ROANOKE, VA.—THE VIRGINIA BRIDGE & IRON CO., of this city, was awarded the contract for building 75 bridges for the Tidewater Railway Co. The work will cost $700,000.

INDIANOLA, MISS.—The contract for the new bridge at this place was awarded to the BELLEFONTAINE BRIDGE & IRON CO., of Bellefontaine, O.

FREMONT, O.—It is reported that plans are in progress for replacing what is known as the camel-back bridge at this place by a new concrete structure.

PORTSMOUTH, O.—The contract for furnishing and erecting the steel joists for the Scioto River bridge at this place was awarded to HUSTON & CLEVELAND, of Columbus, O.

CINCINNATI, O.—It is reported that a viaduct costing $75,000 is planned to cross Duck Creek at a point where Fairview Ave. connects Hyde Park and Evanston. J. M. Eilers, Councilman-elect, is interested.

LISBON, O.—The Pittsburg, Fort Wayne & Chicago Railway Co. has plans completed for a new bridge at West St. in this city.

INDIANAPOLIS, IND.—Bids are asked by Cyrus J. Clarke, County Auditor, for $170,000 bridge bonds.

The Board of Public Works is taking bids on the superstructure of the Stewart Ave. bridge. Previous bids were too high and were rejected.

DETROIT, MICH.—It is reported that the draws of the Cuyohoga River bridges will be widened to allow passage of the new steamers of the Detroit & Cleveland line.

QUINCY, ILL.—The contract for erecting the bridge over Little Mill Creek on the South Columbus road was awarded to J. B. DIVER, of Ellington, Ill.

ROCK ISLAND, ILL.—An appropriation of $3,717 was voted for the construction of bridges in different townships.

TRADELAKE, WIS.—Bids are asked by Tobias Thoreson, Chn. Com., until noon, Jan. 17, for construction of a steel bridge in Section 19, T 37, R 18, town of Tradelake, Wis.

WAUPACA, WIS.—Bids are asked by the Town Board until noon, Jan. 16, for the construction of a stone arch bridge across the Waupaca River at this place. C. C. Boyce is Chn. Com.

MINNEAPOLIS, MINN.—Bids are asked by County Commissioners of Hennepin County until 11 a. m., Jan. 15, for rebuilding and repairing bridges Nos. 7, 8, 23, 55 and 257. H. R. Scott is County Audr.

ST. LOUIS, MO.—It is reported that a bridge is to be erected at Cass Ave. Charles Stutz, of the Cass Avenue Business Men's Association, is interested.

WICHITA, KAN.—Bids were opened and contracts awarded for construction of two new steel bridges, as follows: THE WICHITA CONSTRUCTION CO., of this city, was awarded contract for constructing the bridge over the slough in Waco Township; THE CANTON BRIDGE CO., of Canton, O., was awarded contract for construction of bridge across Spring Creek.

HOUSTON, TEX.—Bids are asked by J. B. Ashe, County Audr., until 11 a. m., Jan. 11, for constructing a new bridge across Cypress Creek on East Montgomery road.

PROSSER, WASH.—Bids have been submitted for the construction of the Sixth St. bridge here. F. W. Berndt submitted low bid. No contract awarded.

MEDICAL LAKE, WASH.—The contract for constructing the bridge across the north end of Medical Lake at Fifth St. was awarded to WILLIAM OLIVER, of this city.

ASTORIA, ORE.—Plans have been completed for the construction of a bridge across the Columbia River at this place by the Portland & Seattle Railroad Co.

TWICKENHAM, ORE.—It is reported that Mayor J. K. Barry is agitating the matter of constructing a bridge across the John Day River at this place.

WALLOWA, ORE.—It is reported that the new survey of the Oregon Railway & Navigation Co.'s line will necessitate a bridge across Wallowa River near this place.

PORTLAND, ORE.—The contract was awarded to the AMERICAN BRIDGE CO., 42 Broadway, New York, for constructing the bridge over Clearwater River for the Oregon Railway & Navigation Co. Cost, $190,000.

ALHAMBRA, CAL.—Bids are asked by the Board of Supervisors until 2 p. m., Jan. 8, for constructing a steel culvert on the Alhambra road east of the city boundary. C. G. Keyes is City Clk.

SALT LAKE CITY, UTAH.—It is reported that the Oregon Shortline Railroad Co. will build a new bridge on North Temple St., between Third and Fifth West Sts. here.

VANCOUVER, B. C.—It is reported that a new bridge across False Creek at this place is contemplated.

BUILDINGS.

The names of parties awarded contracts are printed in capital letters.

QUINCY, MASS.—Bids were received on Dec. 28 for alterations and additions to Quincy High School, as follows: Bigelow & Mable, Boston, Mass., $136,485; M. M. Dyer, Medford, Mass., $133,000; Geo. E. Thomas & Jno. Harkins, Quincy, $127,600; F. C. Alexander, Boston, $124,000; Alfred H. Hines, Somerville, Mass., $122,950; Clark & Lee, Boston, $119,999; Marr Bros., Boston, $119,875; F. H. Jackson & Son, Brockton, Mass., $115,810; A. Fales & Son Co., South Framingham, Mass., $112,500; Coburn & Boughton, Boston, $110,916; Rufus E. Lord, Boston, $110,500; John E. Locatelle & Co., 15 School St., Boston, $109,500. Contract has not been awarded.

CHELSEA, MASS.—Bids are asked by T. B. Harris, Paymaster Gen. U. S. N., Washington, D. C., until 10 a. m., Feb. 6, for the construction of two quarters for officers at the U. S. Naval Hospital, Chelsea, Mass.

HOLYOKE, MASS.—Plans have been completed for the new school building to be erected here. There will be 16 class rooms. E. A. Ellsworth, of Holyoke, is Arch. Cost, $75,000.

BROOKLYN, N. Y.—Competitive plans have been submitted by five architects for the proposed Young Men's Christian Association building to be erected on Manhattan Ave., between Meserole and Norman Aves., Greenpoint. The building will occupy a plot 100 × 100 ft. It will contain a well equipped gymnasium 40 × 70 ft., an assembly hall to seat 350, a class and banquet hall, bowling alleys, swimming pool, and lockers for 1,000 men.

NEW HAVEN, CONN.—Separate contracts were awarded for the construction of the new armory building for Troop A, as follows: Carpentry, to C. A. KNOLL; masonry, to the SPERRY CO.; plumbing, to ROURKE BROS.; heating, to the MAHER HEATING CO.; electric wiring, to the NEW ENGLAND ENGINEERING CO., and painting, to CHARLES KANNEIGESER, all of New Haven, Conn.

NEW YORK, N. Y.—Bids are asked by John O'Brien, Fire Comr., until 10.30 a. m., Jan. 11, for constructing additions and making alterations to quarters of Hook and Ladder Co. No. 12 at 243 West 20th St., Boro. of Manhattan.

NEW YORK, N. Y.—Bids are asked by C. B. J. Snyder, Supt. School Bldgs., until 11 a. m., Jan. 15, for forming bath room, etc., in Public School No. 120, at 187 Broome St., Boro. of Manhattan. Also for general construction to and alterations in Public School No. 121, on 103d St., near Second Ave., Boro. of Manhattan. Also for installing heating apparatus in hall of Board of Education, at 59th St. and Park Ave., Boro. of Manhattan.

Bids are asked by John W. Brannan, Pres. Bd. of Trustees Bellevue and Allied Hospitals, until 3 p. m., Jan. 12, for constructing repairs to iron balconies on the Ward Wings of the new Harlem hospital, on 136th St. and Lenox Ave., Boro. of Manhattan.

Marc Eidlitz & Son, 489 Fifth Ave., New York, are taking figures on all sub-contracts for the new office building for the New York Evening Post at 20-24 Vesey St., New York. R. D. Kohn, 170 Fifth Ave., is Arch. Building is to be 12½ stories, 75 × 100 ft.

NEW YORK, N. Y.—LIST & ROSE, 1947 Broadway, New York, have been awarded the general contract for constructing the settlement house at 329-331 East 62d St. for the Bethel Sisterhood, 25 West 26th St., New York. Building will be fireproof, brick and stone, four stories, 35 × 100 ft. Pollard & Steinman, 234 Fifth Ave., New York, are Archs.

Plans are in progress for a store and loft building at 718-720 Broadway, New York, for R. H. McDonald & Co., 5 West 31st St. Building will be brick and stone, fireproof, eleven stories, 50 × 150 ft. C. E. Birge, 5 West 31st St., New York, is Arch.

A. B. Knight, 1947 Broadway, New York, is taking bids on all sub-contracts for an apartment house on 95th St. and Amsterdam Ave. Cost, $100,000.

The contract for erecting an automobile garage at 225-231 West 49th St., New York, for R. F. Frank, was awarded to FANNING & RILEY, 150 Fifth Ave. The contract for the structural iron was awarded to the HINKLE IRON CO., 534 West 56th St., New York.

NEW YORK, N. Y.—Plans have been filed for a 3-story hook and ladder house, 50 × 75 ft., at 142-144 West 63d St., New York. B. W. Levitan, 20 West 31st St., is Arch. Cost, $60,000.

NEW YORK, N. Y.—The contract for the new building for the Royal Insurance Co., of Liverpool, England, 50 Wall St., New York, at 84-86 William St. and 67-71 Maiden Lane, was awarded to C. T. WILLS, 156 Fifth Ave., New York. The new building will be 18 stories, brick, stone and terra cotta. Howells & Stokes, 100 William St., are Archs.

The contract for erecting a $200,000 addition to the Rhinelander Bldg. at Duane and William Sts., New York, has been awarded to EDWARD CORNING & CO., 656 Broadway, New York. Addition will be 12 stories, 85 × 100 ft. Clinton & Russell, 32 Liberty St., are Archs.

Plans are in progress for a Home for the Aged, on 183d St., near Belmont Ave., Bronx. Building will be fireproof, 200 x 250 ft. R. F. Almirall, 51 Chambers St., New York, is Arch.

NEW YORK, N. Y.—The general contract for constructing a club-house for the Delta Phi fraternity at 116th St. and Broadway, New York, was awarded to GEORGE VASSAR'S SON & CO., 111 Fifth Ave. Thomas Nash, 1170 Broadway, New York, is Arch.

Plans are in progress for a residence for R. S. Brewster, 51 Wall St., New York, at 70th St. and Park Ave. Delano & Aldrich, 4 East 39th St., New York, are Archs. Cost, $100,000.

Plans have been filed for a 6-story flat on 112th St. and Madison Ave., New York, for A. Denziger, 14 East 111th St. Bernstein & Bernstein, 24 East 23d St., New York, are Archs. Cost, $50,000.

Plans have been completed for two 6-story apartment houses at 11th St., near Avenue C, New York, for Hillman & Price, 236 Grand St. Owners build. Cost, $100,000.

NEW YORK, N. Y.—Plans are completed for two 6-story brick tenements at 120th St., near Pleasant Ave., New York, for Epstein & Cohen, 8 West 114th St. Bernstein & Bernstein, 24 East 23d St., New York, are Archs. Cost, $90,000.

Plans have been completed for an apartment house for M. Rock, at 315 Fifth Ave., New York. The building will be 11 stories, 29 × 150 ft. Maynicke & Franke, 298 Fifth Ave., are Archs. Cost, $200,000.

Plans are completed for two 6-story tenements for Jacobs & Hulkoff, 608 Fifth Ave., at 124th St., near Second Ave., New York. E. A. Meyers, 19 Union Square, New York, is Arch. Cost, $85,000.

Plans are filed for an $80,000 alteration to a private school and dwelling for J. S. Kennedy, 31 Nassau St., at 30 West 55th St., New York. J. B. Baker, 156 Fifth Ave., is Arch.

NEW YORK, N. Y.—Plans are completed for a 10-story high-class, elevator apartment house at 138th St. and Riverside Drive for the Cathedral Parkway Realty Co., 137th St. and Riverside Drive. Louis C. Mauer, 22 East 21st St., New York, is Arch. Cost, $160,000.

Plans have been filed for a new fire station house at 513-515 West 161st St., New York. The building will be brick and stone, 50 × 84 ft. F. H. Kimball, 71 Broadway, New York, is Arch. Cost, $62,000.

F. C. Knapp, 900 Union St., Brooklyn, will erect a 6-story brick apartment at 135th St. and Broadway, New York, at a cost of $200,000. J. W. McCullough, 124 West Fourth St., New York, is Arch.

Plans are completed for an alteration to the 8-story brick telephone exchange at 30-34 Gold St., New York, for the New York Telephone Co., 15 Dey St. Eidlitz & McKenzie, 1123 Broadway, New York, are Archs. Cost, $50,000.

NEW YORK, N. Y.—Bids have been submitted but no contract awarded for a stable and warehouse at 672 Water St. for Robert Noble, 18 Jackson St., New York. J. H. Friend, 148 Alexander Ave., New York, is Arch.

Plans for extensive alterations to the Thirty-fourth Street National Bank building have been completed. E. R. L. Gould, 41 West 34th St., New York, is Pres. Hiss & Weeks, 111 Fifth Ave., are Archs.

BROOKLYN, N. Y.—Bids are asked by C. B. J. Snyder, Supt. School Bldgs., 59th St. and Park Ave., New York, until 11 a. m., Jan. 15, for general construction of and alterations in Public School No. 66, at Union Place, between Tulip and Walnut Sts., Brooklyn Hills, Boro. of Queens. Also for installing electric elevators in the manual training school building on Seventh Ave., between Fourth and Fifth Sts., Boro. of Brooklyn.

ALBION, N. Y.—It is reported that a new $75,000 school building is under consideration for this city. Albert C. Burrows is Chn. Com.

OSWEGO, N. Y.—Plans have been prepared by Johnson & Williams, Archs., Ogdensburg, N. Y., for the new hospital building here.

GLOVERSVILLE, N. Y.—The contract for erecting the new school building here was awarded to D. A. HAYS, of this city. The contract for heating and plumbing was awarded to BREEN BROTHERS, of Utica, N. Y. The contract for electric wiring was awarded to A. C. SCRIBNER, of Gloversville, N. Y.

GENEVA, N. Y.—It is reported that the New York Central & Hudson River Railroad Co. will erect a new passenger station here soon.

MALONE, N. Y.—A bill has been introduced in the House of Representatives appropriating $75,000 for a new post-office building here. The building will also accommodate the local United States customs force.

NEWARK, N. J.—Plans have been completed for a warehouse at Frelinghuysen Ave., Newark, for H. H. Koch & Co., of Wickliffe St. The building will be three stories, frame, covered with corrugated iron, 250 × 350 ft. Arthur Connelly, 142 Market St., Newark, is Arch.

Separate contracts for the construction of the 6-story store and office building for C. Schmidt, at 157-159 Springfield Ave., Newark, have been awarded as follows: Mason work was awarded to F. FATZLER & CO., 558 South Tenth St., Newark; the carpentry work was awarded to F. KULOIS, 13 South Sixth St., Newark. E. Worth, 75 Market St., is Arch. Cost, $75,000.

SECAUCUS, N. J.—The contract for the general construction of the new alms house at this place was awarded to TIERNEY & CONNOLLY, 226 Pavonia Ave., Jersey City, at $232,800. C. F. Lang, 1 Montgomery St., Jersey City, is Arch.

SALEM, N. J.—It is reported that the Salem County Freeholders contemplate the erection of a new hospital for the insane.

PHILADELPHIA, PA.—Plans and specifications are on file at office of Engineering News, 220 Broadway, New York, for erecting a boiler-house and chimney at Belmont pumping station, Fairmont Park, Philadelphia, Pa. Bids will be opened at Room 712, City Hall, Jan. 23.

Plans have been prepared for an 8-story apartment house at Juniper and Spruce Sts. McIlvaine & Roberts, Land Title Bldg., are Archs.

Tentative plans have been drawn for a 15-story hotel on Broad St., to occupy the site of the Beth Eden church. The approximated cost is $3,000,000, and if the project is completed as planned the hotel will be a rival of the St. Regis in New York. Henry Ives Cobb, 42 Broadway, New York, is Arch.

Plans have been prepared for the branch Carnegie library at 17th and Spring Garden Sts. The building will be two stories, 80 × 100 ft. Cost, $70,000. Field & Medary, 1414 South Penn Square, Philadelphia, are Archs.

PITTSBURG, PA.—Plans have been prepared for a 12-story office building for the Pittsburg Physicians Supply Co. at Pennsylvania Ave. and Seventh St. The ground plot is 40 × 137 ft. Frank J. Saupp is Secy. James P. Steen, Smith Bldg., Pittsburg, is Arch. Cost, $350,000.

ALLENTOWN, PA.—Plans are in progress for remodeling the Academy of Music at this place. A. E. Westover, Keith Bldg., Philadelphia, is Arch. Cost, $75,000.

SOUTH BETHLEHEM, PA.—Plans have been completed for St. Bernards Catholic church to be erected here. Cost, $75,000. A. W. Leh, 203 West Fourth St., South Bethlehem, is Arch.

BALTIMORE, MD.—It is reported that the Johns Hopkins Club is preparing to erect a new club-house. A. M. Elliott is interested.

WASHINGTON, D. C.—Plans have been completed for an apostolic residence, at Columbia Ave. and Baltimore St. The building will be fireproof, stone and steel. Cost, $100,000. A. O. Von Herbulis, Kellogg Bldg., Washington, is Arch.

The Anheuser-Busch Brewing Association has purchased lots No. 40 to 43, fronting 100 ft. on North Capitol St. and 110 ft. on F St., near the new union station. It is the intention of the association to erect a large hotel.

NORFOLK, VA.—The contract for the electric freight elevator in the store-house for torpedo boats at the navy yard was awarded to the BRODESSOR ELEVATOR CO., of Milwaukee, Wis.

FORT MORGAN, ALA.—Bids are asked by Samuel R. Jones, Ch. Q. M., until 11 a. m., Jan. 26, for constructing a shelter for search light trucks at Fort Morgan, Ala.

JASPER, ALA.—Bids are asked by the Commissioners of Walker county, until noon, Jan. 8, for the erection of a court-house. Cost, $75,000.

NATCHITOCHES, LA.—Administrators of the State Normal School have adopted plans for a 4-story building to cost $80,000. B. C. Caldwell is Pres.

NEW ORLEANS, LA.—Bids are asked by Hugh McCloskey, Member of Port Comrs., until Feb. 6, for erecting seven steel sheds. J. F. Coleman, 920 Hibernia Bank Bldg., New Orleans, is Engr.

NASHVILLE, TENN.—It is reported that $500,000 will be expended in remodeling the Maxwell Hotel in this city. W. H. Black is Mgr.

MEMPHIS, TENN.—The plans of R. H. Hunt, Arch., Chattanooga, Tenn., have been adopted by the First Baptist Church for their proposed building. Cost, $60,000. A. M. Boone is pastor.

Plans are in progress for a new 6-story Business Men's Club on Monroe St. Shaw & Pfeil, 41 Madison St., Memphis, are Archs. Cost, $100,000.

MAYFIELD, KY.—It is reported that the Mayfield Home Telephone Co. will erect a new telephone exchange building.

WOODSFIELD, O.—The plans of S. Hannaford & Son, Archs., Hubert Bldg., Cincinnati, have been adopted by the County Commissioners for the proposed court-house here.

MUNCIE, IND.—Plans are in progress for a new school building for this city. M. S. Mahurin, Ft. Wayne, is Arch.

INDIANAPOLIS, IND.—It is stated that Geo. J. Marott, of this city, will construct a department on Massachusetts Ave., at a cost of $175,000.

MADISON, IND.—Plans have been completed for the erection of a $300,000 hospital here. Foltz & Parker, 28 Union Trust Bldg., Indianapolis, are Archs.

MARQUETTE, MICH.—It is reported that the south wing of the Northern State Normal School will be rebuilt soon, at a cost of $50,000.

CHICAGO, ILL.—Plans have been completed for an 18-story office building for the Commercial National Bank, on Clarke and Adams Sts. Size 180 × 190 ft. Cost, $1,500,000.

OAK PARK, ILL.—Plans have been completed for a hospital building for the Oak Park Hospital Association. George L. Harvey, 615 Dearborn St., Chicago, is Arch.

LA CROSSE, WIS.—Bids are asked by Schick & Roth, Archs., La Crosse, until Jan. 20, for the construction of a church for the Norwegian Lutheran congregation. Size 50 × 150 ft. Construction to be of native stone.

AMES, IA.—Bids are asked by Secy. of Bd. Trustees of the Iowa State College, until 2 p. m., Feb. 9, for the erection of a 4-story stone building for the Agricultural Department. Proudfoot & Bird, 712 Crocker Bldg., Des Moines, are Archs.

LOGAN, IA.—Bids are asked by E. C. Longman, Secy. Bd. Education, until 3 p. m., Feb. 5, for installing heating and plumbing in the new high school building here.

FAIRMONT, MINN.—The contract for erecting the new court-house here was awarded to J. B. NELSON & CO., of Mankato, Minn., for $84,500.

BANCROFT, NEB.—Bids are asked by Delia F. Carey, Secy. Bd. of Education, until 7.30 p. m., Jan. 31, for constructing a new school building in Bancroft. The Eisentraut-Colby-Pottinger Co., Sioux City, Iowa, is Arch.

OMAHA, NEB.—Plans are being prepared by T. R. Kimball, Arch., Omaha, Neb., for the proposed Young Women's Christian Association building here. Cost, $125,000.

ST. LOUIS, MO.—The Ely-Walker Dry Goods Co. contemplates erecting a 9-story building here at a cost of $850,000.

FORT RUSSELL, WYO.—The contract for erecting the cavalry drill hall at this place was awarded to R. W. BRADLEY & CO., of Cheyenne, Wyo., for $54,231.

BUTTE, MONT.—The contract for erecting the new school building at this place was awarded to CHARLES KOCH & CO., of this city.

ARGENTA, ARK.—Bids are asked by Robert R. Stevens, Ch. Q. M., until noon, Jan. 26, for installing plumbing, heating and electric wiring at Fort Logan. H. Roots, Ark.

COLORADO SPRINGS, COL.—It is reported that the Colorado Midland Railway Co. will erect a $50,000 station here.

OAKLAND, CAL.—It is reported that the Claremont Hotel Co. of this city is receiving competitive plans from architects for a new $200,000 hotel here.

STOCKTON, CAL.—See under Streets and Roads.

RIVERSIDE, CAL.—Bids were opened Jan. 2 at the Indian Office, Department of the Interior, Washington, D. C., for constructing a brick industrial building, with plumbing, electric light, water and sewer connections for the Sherman Industrial School. W. D. Lovell, Minneapolis, Minn., submitted low bid at $9,060.

WATER SUPPLY—IRRIGATION.

The names of parties awarded contracts are printed in capital letters.

NEWBURYPORT, MASS.—It is stated that council is considering improvements to the water system to cost $75,000. Freeman C. Coffin, 826 Exchange Bldg., Boston, Mass., is Engr.

ALBANY, N. Y.—Plans and specifications are on file at office of Engineering News, 220 Broadway, New York, for construction of pumping engines at the Quackenbush St. station. Bids are asked until Jan. 15, as noted on Dec. 21.

BROOKLYN, N. Y.—A contract has been awarded to SILAS W. TITUS, 662 Carroll St., Brooklyn, to increase the water supply of Brooklyn. The work will be done mostly at the Jamaica pumping station and it is estimated that 1,000,000 gallons per day will be added to the present supply. The cost is estimated at $60,000.

NEW YORK, N. Y.—The contract for high-pressure water mains has been awarded to the CONTINENTAL ASPHALT PAVING CO., 42 Broadway, New York, at $2,824,283. Noted on Dec. 28.

NEW YORK, N. Y.—The Board of Aldermen have authorized the purchase of three centrifugal pumps at an estimated cost of $30,000. W. B. Ellison is Comr. Dept. Water Supply, Gas and Electricity.

PATCHOGUE, L. I., N. Y.—The village trustees are investigating the building of a municipal water plant.

HADDONFIELD, N. J.—The town has voted in favor of establishing a water plant. J. Morris Roberts is Mayor.

AVALON, N. J.—It is stated that the contrat for water pipe, hydrants, etc. (noted on Dec. 7), has been awarded to A. G. RICE & CO., Sea Isle City, N. J.

ALBURTIS, PA.—E. D. Miller, Supervisor, is stated to have granted to a New York firm the right to construct a water system here.

DALLASTOWN, PA. — The Dallastown Water Co. has increased its capital stock from $12,000 to $30,000 for the purpose of improving and extending its plant.

WASHINGTON, D. C.—The secretary of the interior has approved the Tieton and Sunnyside irrigation projects and set aside $1,750,000 for construction. The approval was given with a proviso that certain questions affecting the two projects be cleared up to the satisfaction of the government. The allotment of $1,750,000 for these projects, added to the amount set aside for the Okanogan scheme, makes a total for $2,250,000 officially promised for the reclamation of Washington lands.

WASHINGTON, D. C.—Bids were opened at the office of the Commissioners of the District of Columbia on Dec. 30 for a vertical triple expansion crank and fly wheel, condensing pumping engine, for the new pumping station, Trumbull St. Bids were as follows: Holly Manufacturing Co., Buffalo, N. Y., $81,390 and $74,900; Camden Iron Works, Camden, N. J., $89,900; Allis-Chalmers Co., Milwaukee, Wis., $74,800, $[illegible] and $[illegible]700; William Tod Co., Youngs[illegible], O., $[illegible]550, $84,000 and $87,800. Th[illegible]gine is to have a capacity of 30,000,000 gallons per day.

PORTSMOUTH, VA.—The [illegible] of Aldermen is considering issuance [illegible] bonds for the purpose of a[illegible] or constructing water-works.

PARKERSBURG, W. VA.—[illegible] has passed ordinance providing for [illegible] of a tract of land for the purpose [illegible] a reservoir. The Board of [illegible] is considering the installation of [illegible] 250 HP. capacity and a heater [illegible] be installed at the water-works pumping [illegible].

WAYCROSS, GA.—See under [illegible] Atlantic Coast Line R. R.

PALATKA, FLA.—Bids will probably be asked in 30 days for the [illegible] of the water-works. W. W. Lyon, [illegible] Palatka, is Consult. Engr.

ARCADIA, FLA.—Town is preparing for the construction of a new water works plant.

ABERDEEN, MISS.—See under Sewerage.

AKRON, O.—Louis M. [illegible], Asst. Supt. Akron Water-Works Co., [illegible] that $125,000 will be expended [illegible] improvements and extensions this spring. [illegible] company will let the contract for con[illegible] a trench for the 48-in. conduits in F[illegible]. It will extend from the main recei[illegible] well to the pumping station, a distance of [illegible] 2,500 ft. and will have a depth of 17 [illegible]. The contract for drilling wells in connec[illegible] with this work has been awarded to WILLIAM HARMON, Tiffin, O.

CINCINNATI, O.—It is reported that bids are asked until Jan 30 for con[illegible] pumping buildings, foundations and other work for the Western Hills Pumping Sta[illegible]. A. Hermann, Pres. Bd. Trustees Water-works.

FORT WAYNE, IND.—Bids were received by F. W. Urbahns, Secy., Trustee of Water-Works, on Dec. 21, for furnishing work and material for the improvement of the city water-works. The work includes a high-duty pumping engine of 10,000,000 gallons capacity per day; an auxiliary pumping plant of 6,000,000 gallons capacity per day, a vertical shaft and centrifugal pump, with electric motor, of a capacity of 2,000 gallons per minute; a deep well pump for use in a tubular well; two 1.50 HP. boilers; two automatic stokers for boilers; a feed water heater and purifier; reinforced concrete reservoir of 8,000,000 gallons capacity; cast iron pipe and special castings; gate valves; laying pipe and setting valves. Daniel W. Mead, 738 First National Bank Bldg., Chicago, Ill., is Consult Engr. The lowest bidder on the 10,000,000-gallon pump was the Marine Engine & Machine Co., 126 Liberty St., New York. This bid was informal, as sizes of parts were not given. The next lowest bid was that of the Snow Steam Pump Works, Buffalo, N. Y., at $27,200, for an 8,000,000-gallon pump, the Marine Engine & Machine Co. was lowest bidder, but, for reasons stated above, this bid also was informal. The next lowest bidder was the Snow Steam Pump Works, at $22,175; for a 9,000,000-gallon pump, the Laidlaw-Dunn-Gordon Co., Cincinnati, O., was only bidder, at $22,500; on the 6,000,000-gallon auxiliary pump the Snow Steam Pump Works was lowest bidder, at $8,150; for 2,000-gallon auxiliary pump the Dayton Hydraulic Co., Dayton, O., was lowest bidder at $1,320.

FORT WAYNE, IND.—Bids were opened Dec. 21 for furnishing work and material for improvement of the city water-works. The only bidder for the construction of a storage reservoir or one-half of the same was Herman Tapp, whose bid was $129,851 for the whole reservoir or $69,150 for one-half. For an 8,000,000 gallon pumping engine as well as for a 10,000,000 gallon pumping engine, the Hisled Co., St. Mary's, O., was lowest bidder at $12,200 for the smaller and $15,950 for the larger. For a 6,000,000 gallon auxiliary pumping plant, the Snow Steam Pump Works, Buffalo, N. Y., was lowest bidder at $8,150.

INDIANAPOLIS, IND.—Plans are being considered by the Indianapolis Water Co. for a better service in Irvington. It is believed that a reserve pumping station will be built.

CASEY, ILL.—The council has granted a water-works franchise for 30 years to W. W. Jamison and W. E. Strather.

CHICAGO, ILL.—H. C. Gardner, Supt. of Construction for Swift & Co., is working on plans for a private water-works system for the stockyards.

MILWAUKEE, WIS.—Bids were opened on Dec. 20 for the construction of a brick tunnel under the Milwaukee River. It is reported that the contract was awarded to M. H. McGOVERN, Chicago, Ill.

SIOUX CITY, IA.—It is reported that surveys are being made for the Perry Creek conduit to cost $250,000 and the Beacon Creek conduit to cost $60,000. The matter will be submitted to the voters in March. J. M. Lewis is City Engr.

BISMARCK, N. DAK.—Plans and specifications are on file at office of Engineering News, 220 Broadway, New York, for constructing water main at Fort Lincoln, N. Dak. Bids are asked until Jan. 11 by Lieut. Col. J. E. Sawyer, Q. M., St. Paul, Minn., as noted on Dec. 21.

ELDORADO, KAN.—Bonds for $27,500 will be issued in a short time for water-works purposes.

DE QUEEN, ARK.—The O'NEIL ENGINEERING CO., of Dallas, Tex., have been awarded the contract for constructing water-works here. Estimated cost $13,000.

Bids are asked by L. A. Pearre until Feb. 15 for the purchase of cast-iron water pipes, valves, pumps and boilers necessary for the construction of a water-works system. Specifications and list of requirements may be had by addressing the O'Neil Engineering Co., Dallas, Tex. Advertised, Engineering News.

ALTA LOMA, TEX.—C. S. TUCKER, of Houston, Tex., has been awarded contract for building pumping plant here at $6,177.

EAGLE LAKE, TEX.—The Eagle Lake Water-Works Co. has been incorporated with capital stock of $10,000. H. Matthews, B. L. Vineyard and J. C. Sempres, of this town, are incorporators.

DALLAS, TEX.—It is reported that the probable cost of installing a large service pump at Turtle Creek pumping station and a building to house it and the machinery will be about $200,000. J. M. Bassett is Ch. Engr. Water-works.

HOBART, OKLA.—It is stated that plans and specifications will be prepared for about four miles of new mains and the construction of a water tower.

ELK CITY, OKLA. (post-office Busch).—City will vote Jan. 18 on the proposed bond issue for the construction of water-works.

MUSKOGEE, IND. T.—COOK & SON, of Junction City, Ks., are reported to have secured the contract for constructing seven miles of 6-in. water mains, 70 hydrants and 50 valves and boxes.

LIMON, COLO.—The Limon Artesian Water Co. has been formed with capital of $10,000. Field Bohart is among those interested.

GREELEY, COLO.—The Owl Creek Supply & Irrigation Co. has awarded the contract for the construction of 3½ miles of ditches to the KNOWLTON & BOLLEN CONSTRUCTION CO. Estimated cost, $9,000.

George G. Anderson, Consult. Engr., 501 Equitable Bldg., Denver, writes us that election was held in Greely on Dec. 26 to decide concerning issuance of $350,000 of bonds for water-works construction. The proposed improvements embrace bringing water from the Cache-la-poudre River, a distance of 38 miles, the construction of a 26,500,000 gallon sedimentation basin, a filtration plant, slow sand, a 5,000,000 gallon storage reservoir, 38 miles of continuous wood stave pipe line and necessary valves, etc. Bids will probably be asked in a short time.

GREELEY, COLO.—Bids are asked until 7 p. m., Feb. 6, for furnishing materials for and the construction of a gravity water system. M. P. Henderson, City Clk. (Advertised, Engineering News.) Regarding the above, George G. Anderson, Consult. Engr., 501 Equitable Bldg., Denver, Colo., writes us that the proposed work will consist of bringing the water from the Cache-la-poudre River, a distance of 38 miles, in pipes of 20-in. diameter; the construction of a 26,500,000-gal. sedimentation basin, a filtration plant, slow sand, and a 5,000,000-gal. storage reservoir.

ROSWELL, N. Mex.—J. N. Chipley and Lee Reynolds, of Denver, Colo., have applied for a franchise to supply this city with water.

GALLUP, N. Mex.—It is reported that bids are asked until Jan. 6 for increasing the capacity of the water-works. Estimated cost of works, $10,000. F. W. Meyers is Town Clk.

SEATTLE, WASH.—Plans and specifications are being drawn for a 1,000,000-gallon stand pipe in Volunteer Park. Estimated cost, $65,000. R. H. Thompson is City Engr.

SUNNYSIDE, WASH.—City has voted to issue bonds for a water and light plant. W. B. Bridgman is Mayor.

ONTARIO, ORE.—Council has granted 10-year franchise to Seymour H. Bell to put in a $50,000 water system.

INDEPENDENCE, ORE.—City has voted to issue $35,000 of bonds for establishing a gravity water system. A 250,000 gallon reservoir will be built 2½ miles from city at an elevation of 175 ft.

ST. JOHNS, ORE.—Council is considering issuance of bonds for a municipal water system.

ATHENA, ORE.—Council has purchased the Gallagher Springs, three miles southeast of this city, and is now making arrangements for the use of water from Green Springs, which are four miles beyond the Gallagher Springs. The cost of the water supply from the Gallagher Springs will be about $16,000. It will be piped into 250,000 gallon reservoir 1½ miles below the springs.

SAN DIEGO, CAL.—William Clayton, Managing Dir. Southern California Mountain Water Co., has stated that $450,000 of the company's stock will be sold for the purpose of carrying forward the water system for this city. The contract for the pipe line between Bonita and this city will probably be let about Jan. 15.

PASADENA, CAL.—S. W. Dorsey and the Pasadena Heights Syndicate have purchased the stock of the East Pasadena Water Co. for $250,000. The company will be reorganized, the equipment put in efficient order and a distributing reservoir built.

MURRAY (Salt Lake City post-office), UTAH.—It is reported that water-works will be constructed here at a cost of about $15,000. R. E. Caldwell, of Salt Lake City, is Engineer-in-Charge.

SALT LAKE CITY, UTAH.—It is reported that the contract for the construction of a brick and concrete conduit along the line of Salt Lake and Jordan Canal from South Temple and Third East St. to Fifth South and Ninth East Sts., was awarded to HAMLEY & RITCHIE, of Topeka, Kan., at $13,-662.

PETERBOROUGH, ONT.—It is stated that the town will spend $15,000 on water-works, $3,385 on sewers and $13,924 on granolithic sidewalks.

SASKATOON, SASK.—It is stated that the town will install a water-works system at a cost of about $125,000.

VANCOUVER, B. C.—Council is preparing to ask bids for 50 hydrants of the most approved design.

WINNIPEG, MAN.—Bids are asked until 3.30 p. m., Jan. 22, for supplying a turbine pump, with electric motor, for city water-works. C. J. Brown, City Clk. (Advertised, Engineering News.)

SEWERAGE.

The names of parties awarded contracts are printed in capital letters.

WATERBURY, CONN.—Bids were opened Dec. 30 for constructing Sects. 1 and 2 of main carrier for sewage disposal works. Contract for the former was awarded to CROUSE CONSTRUCTION CO., Perth Amboy, N. J., whose bid of $70,843 was lowest. Contract for Sect. 2 was let to FRED T. LEY & CO., Springfield, Mass., at $25,120.

NEW YORK, N. Y.—Bids are asked until 11 a. m., Jan. 9, for the construction of several sewers and receiving basins in the Borough of Bronx. L. F. Haffen, Boro. Pres.

ATLANTIC CITY, N. J.—The council has passed an ordinance authorizing the expenditure of $400,000 for improvements and extension of the present sewer system here.

LONG BRANCH, N. J.—City is considering purchase of the plant of the Long Branch Sewer Co., at $232,667. J. W. Seaman is City Engr.

PITTSBURG, PA.—The contract for the construction of sewers in several streets has been awarded to M. O'HERRON & CO., South First and Keen Sts., at $13,184.

ALLENTOWN, PA.—H. F. Bascom, Engr., will prepare plans for a sewage disposal plant and sewer system here. Cost is estimated at $700,000.

WINCHESTER, VA.—Council is considering the employment of an engineer to draw up plans and specifications for a sewer system.

LEXINGTON, N. C.—Bids are asked until 2 p. m., Jan. 25, for furnishing a sewer system. J. L. Ludlow, Winston, N. C., is Engr. J. H. Moyer, Mayor. (Advertised, Engineering News.)

WAYCROSS, GA.—See under Railways—Atlantic Coast Line R. R.

GAINESVILLE, FLA.—Bids are asked until 3 p. m., Jan. 25, for construction of a sanitary sewer system. W. W. Hampton, Secy. Bd. Pub. Wks.. (Advertised, Engineering News.)

BESSEMER, ALA.—Council has authorized the mayor to borrow $15,000 for the purpose of constructing a storm sewer on Second Ave. W. J. Parkes is City Engr.

ABERDEEN, MISS.—Council has sold $20,000 of bonds for water-works and sewerage purposes. J. M. Acker is Mayor.

LOUISVILLE, KY.—Preliminary steps are being taken to provide for a complete sewer system for this city. J. B. F. Breed is City Engr.

COLUMBUS, O.—Julian Griggs, Ch. Engr., Dept. Pub. Service, informs us that the contract for construction of the sanitary sewer system in the territory bounded by Davis Ave., McDowell St., Broad St. and Sullivant Ave. was awarded to C. T. McCRACKEN & CO., of Columbus, at $16,942.

CLEVELAND, O.—It is reported that bids were opened on Dec. 14 for constructing a sewer in Quimby St. Beers & Doolittle, Citizens' Bldg., Cleveland, and John H. Wagner were lowest bidders, bids of each being $31,200.

DELAWARE, O.—It is proposed to erect a sewage disposal plant at the Girls' Industrial Home here to prevent pollution of drinking water of Columbus. R. W. Platt, civil engineer of the state board of health has estimated the cost of this plant at $15,000.

DAYTON, O.—It is reported that bids are asked until Feb. 15 for the construction of a storm sewer system. Cost, $170,000. F. M. Turner, City Engr.

CINCINNATI, O.—Bids were opened Dec. 26 for constructing a sewer in Forest Ave. B. Niehaus was lowest bidder at $12,384.

SOUTH BEND, IND.—It is stated that the bids opened Dec. 20 by the Board of Public Works for constructing 2,434 ft. of 66-in. trunk sewer were as follows: (a) Monolith concrete (reinforced); (b) Parmley reinforced concrete block (patented); (c) Jackson reinforced concrete sewer pipe (patent); (d) circular brick: Hoban & Roach, South Bend, (a) $24,045, (b) $22,707, (c) $25,262, (d) $24,-554; Jas. Nelson, South Bend, (b) $26,544, (c) $26,373, (d) $26,909; F. G. Mortimer, Chicago, Ill., (c) $26,904; L. H. Webster, South Bend, (a) $24,998, (b) $16,140, (c) $21,-565, (d) $23,610; Keogan Constr. Co., South Bend, (a) $29,975, (b) $30,052, (c) $30,117, (d) $31,452.

JACKSON, MICH.—It is reported that the SAVAGE CONSTRUCTION CO., 164 Dearborn St., Chicago, Ill., have been awarded the contract for construction of a reinforced concrete sewage filtration plant to cost about $20,000.

PEORIA, ILL.—Plans are being prepared for the west section of the North Peoria sewer. Cost is estimated at about $350,000.

CHICAGO, ILL.—The board of local improvements, has let the contract to NASH BROS., 84 La Salle St., for a sewerage pumping station to be built at 95th St. and Erie Ave. It will be 1-story, 40 × 83 ft., have concrete foundation, superstructure of pressed brick and stone, slate roof, structural steel and iron, cement floors and cost $60,000. Noted fully on Dec. 21.

BELLEVILLE, ILL.—Legal obstacles have been removed and it is expected that steps will at once be taken to provide city with sewer system and septic tank. Lee L. Harper is City Engr.

SHELDON, IA.—It is stated that the contract for the construction of the sewers and sewage disposal plant at this city has been awarded to G. S. REDMON, of Pipestone, Minn., at about $18,000.

ATLANTIC, IA.—Bids are asked until 7.30 p. m., Jan. 23, for the construction of about six miles of sanitary sewers, manholes, etc. J. J. Rapp, City Clk. (Advertised, Engineering News.)

ST. PAUL, MINN.—The Board of Public Works has estimated the cost of sewers in Thomas and Chatsworth Sts., at $28,575. L. E. Rundett is City Engr.

STORM LAKE, IA.—We are informed that the Iowa Engineering Co., Clinton, Ia., will prepare plans for a sewer system here.

NEBRASKA CITY, NEB.—A. M. Munn, City Engr., is preparing plans for the extension of the sewer system west from Seventh St.

KANSAS CITY, MO.—The following contracts have been awarded by the public improvement committee for sewer work for this city: Parker-Washington Co., 2300 Penn Ave., for constructing sewer in Gilham road, at $129,477; W. C. MULLINS, 515 Colorado Ave., for the 15th St. sewer, at $154,708; BOYD CONSTRUCTION CO., 315 American Bank Bldg., sewers in 35th, Troost, 29th and Harrison Sts., at $30,779.

SHAWNEE, OKLA.—The Missouri, Kansas & Texas Ry. Co., will construct a sewer system in their yards here to cost $8,000.

DALLAS, TEX.—The North Texas Culvert Sewer & Construction Co., of this city, has been incorporated with capital of $30,000. Dr. E. Waggoner is interested.

GREENVILLE, TEX.—The sewer system of this city has been purchased by a company made up entirely of local citizens. The consideration named is $7,500, the purchasers being Looney & Clark, J. H. Whatley, Y. O. McAdams and C. M. Dollins, who will operate under the name of the Greenville Sewer Co.

TRINIDAD, COLO.—The contract for constructing a storm sewer is reported to have been awarded to JOHN McEWAN. Estimated cost is $8,000.

SPOKANE, WASH.—Charles McIntyre, City Engr., has prepared plans and estimates for a sewer system in the Fifth Ward. Estimated cost is $79,500.

SEATTLE, WASH.—Contracts have been awarded for sewers in various streets as follows, in King St., to D. DOW & CO., at $5,-102; in Jackson St., to STIRRAT & GOETZ, at $5,305; in Weller St., to D. DOW & CO., at $4,631; in Main St., to T. I. PETERSON, at $5,210.

KELSO, WASH.—Bids are asked until 5 p. m., Jan. 15, for construction of two miles of sewers. B. L. Hubbell, Town Clk.

HOOD RIVER, ORE.—PAQUET, GEBISCH & JOPLIN, of Portland, Ore., have been awarded the contract for constructing a sewer here at $21,650.

ONTARIO, ORE.—Council has authorized the holding of a special election to vote on proposition of issuing bonds of $25,000 for purpose of installing a drainage system.

OXNARD, CAL.—Local press reports state that contracts for construction of a sewer system have been awarded as follows: A. S. BENT, for interior, $10,529; DONLON & GREENWELL, outfall, $11,324; C. LEONARDT, cement, $1,950; LOS ANGELES SEWER PIPE ASSOCIATION, vitrified pipe, $13,-016; NATIONAL WOOD PIPE CO., wood pipe, $1,979.

LINCOLN, CAL.—The Board of Trustees have decided to call a special election to issue bonds sufficient for the construction of a complete sewer system.

VACAVILLE, CAL.—Preliminary steps have been taken for a bond election to secure funds for a sewer system.

LAKEPORT, CAL.—A septic tank will be constructed here for sewage disposal.

SAN FRANCISCO, CAL.—A bill has been passed providing for the construction of a sewer in Seventh St. to cost $22,000. T. P. Woodward is City Engr.

STOCKTON, CAL.—See under Streets and Roads.

SAN DIEGO, CAL.—Estimates have been made for sewer work in Fifth St. to cost $5,000.

REDDING, CAL.—$152,500 are available for the construction of the Chestnut St. sewer and bids will shortly be asked.

BISBEE, ARIZ.—Council has accepted plans for a sewer system. Bonds will be issued to cover the estimated cost, $77,994.

DOUGLAS, ARIZ.—It is reported that Frank H. Olmsted, of Los Angeles, Cal., has prepared plans and estimates for a sewer system to cost about $65,000. An election will soon be called to vote on issuing the bonds for same.

FREDERICTON, N. B.—Bids were opened on Dec. 28 for construction of a sewer system here and contract was awarded to J. B. McMANUS, Ltd., of Memramcook, N. B., at $42,013. Other bidders were as follows: George Bryne, Boston, Mass., $52,460; Bruno & McKenzie, Boston, Mass., $53,327; Gow & Palmer, Boston, Mass., $53,822; Willard Kitchen, Fredericton, N. B., $58,012; Brown Bros., Fredericton, N. B., $58,708; Mooney & Sons, St. John, N. B., $60,995; Reid McManus, Memramcook, N. B., $74,165. F. A. Barbour, of Snow & Barbour, 1120 Tremont Bldg., Boston, Mass., has been appointed Engr-in-Charge.

PETERBOROUGH, ONT. — See under Water-Works.

GARBAGE DISPOSAL.

The names of parties awarded contracts are printed in capital letters.

BUFFALO, N. Y.—Bonds for $60,000 will be issued to provide for collection and disposal of ashes and garbage.

MUNCIE, IND.—City has accepted plant installed by Decarie Mfg. Co., Minneapolis, Minn., at $11,700.

KANSAS CITY, MO.—City is considering means of disposing of its garbage in event of legislation being passed by Congress to prevent dumping of garbage in Missouri River.

STOCKTON, CAL.—See under Streets and Roads.

STREETS AND ROADS.

The names of parties awarded contracts are printed in capital letters.

NEW HAVEN, CONN.—C. W. Kelly, City Engr., is reported to have estimated the cost of extending Humphrey St. to Allen St., at $62,000.

BUFFALO, N. Y.—Bids were opened Dec. 21 for paving Park St., from Virginia St. to Allen St. The Barber Asphalt Paving Co., 114 Liberty St., New York, was lowest bidder at $3,652.

BROOK HAVEN, N. Y.—The Board of Highway Commissioners of Patchogue and this town have petitioned the Board of Supervisors to improve about 20 miles of roads. Geo. L. Chichester is Town Clk.

CANAJOHARIE, N. Y.—It is stated that the Board of Supervisors have approved of the following state roads. One is from the corporation line of Nelliston easterly along the turnpike to the corporation line of Palatine Bridge, and from Palatine northerly to Stone Arabia Corners, a distance of 3.93 miles. The estimated cost is $34,100. The other road is from Herkimer County line at East Creek to the corporation limits of St. Johnsville, and from the easterly line of that village to a point near the Palatine Church, or the boundary between the towns of St. Johnsville and Palatine, being a distance of 5.62 miles. The estimated cost is $57,500.

CHATHAM, N. Y.—The Board of Supervisors have passed a resolution providing for the construction of a state road between Chatham and Spencertown, a distance of 3¾ miles. The cost is estimated at $18,525.

NEW YORK, N. Y.—Bids are asked until 11 a. m., Jan. 9 for paving, grading, etc., on several streets in the Borough of the Bronx. L. F. Haffen is Boro. Pres.

JERSEY CITY, N. J.—It is reported that bids are asked until Jan. 9 for improving a portion of Wilkinson Ave. George T. Bouton, Clk. Bd. Street and Water Comrs.

SHARON HILL, PA.—Plans have been prepared for three miles of macadam roads. W. M. Anderson is Chn. Com.

PITTSTON, PA.—Plans are being prepared by J. F. Langan, City Engr., for paving a number of streets with vitrified brick. Estimated cost, $30,000.

PITTSBURG, PA.—The contract for paving on Auburn and Chancer Sts., Avondale Place, and Braden, Hamilton, Hector and Murray Aves. has been awarded to the BARBER ASPHALT PAVING CO., 114 Liberty St., New York, at $35,099.

CHATHAM, VA.—The city has voted to spend $15,500 for paving streets.

WAYCROSS, GA.—See under Railways Atlantic Coast Line R. R.

LEESBURG, FLA.—The city has voted to issue $8,000 of bonds for street improvements.

SLIDELL, LA.—It is proposed to build a public road to Lake Ponchatrain at a cost of $10,000.

SHREVEPORT, LA.—Bids are asked until 6 p. m., Jan. 9 for paving about 16,000 sq. yds. in various streets. C. G. Rives, City Comptroller.

NEW ORLEANS, LA.—Preliminary steps are being taken to improve Canal St. W. J. Hardee is City Engr.

MIDDLEPORT, O.—JOHN HUSH of Lancaster, O., has been awarded the contract for street paving at about $12,000.

MARION, O.—Council has passed resolution to pave Main and Bradford Sts. George Dwyer is City Engr.

TOLEDO, O.—It is reported that Superior St. will be extended and paved this spring. Frank I. Consaul is Ch. Engr. Bd. Pub. Service.

CLEVELAND, O.—Bids are asked until 11 a. m., Jan. 13, for grading State Road, No. 3, J. C. Dorn, Clk. Bd. Comrs. Cuyahoga County.

Bids are asked until 11 a. m., Jan. 13, for grading, draining and paving Miles Ave. J. C. Dorn, Clk. Bd. Comrs., Cuyahoga County.

SALEM, IND.—Bids will shortly be asked for the construction of three miles of free gravel road in Gibson township. Frank E. Morris is Auditor of Washington County.

VALPARAISO, IND.—It is reported that bids are asked by the Commissioners of Porter County at Valparaiso until Jan. 10 for the construction of 14 miles of gravel roads in Union township.

TERRE HAUTE, IND.—Plans have been prepared by N. S. Kidder, City Engr., and bids will be asked about March 1 for the construction of 70,000 sq. yds. of vitrified brick pavement on Eighth St. Bids will also be asked about Feb. 1 for constructing 45,000 sq. yds. of pavement on South Third St.

DETROIT, MICH.—Bids will soon be asked for paving Mack Ave. with cedar blocks and curbing same. Estimated cost, $28,100. J. J. Haarer is Comr. Dept. Pub. Wks.

JACKSON, MICH.—GEORGE H. KNEAL has been awarded the contract for constructing six blocks of brick pavement on Michigan Ave. and Elizabeth St. for $10,000.

BIG RAPIDS, MICH.—$20,000 of bonds have been sold to defray expense of paving Michigan Ave. and Maple St.

MONTICELLO, ILL.—The Board of Local Improvements have decided to pave thirty-four blocks of streets here.

MACOMB, ILL.—Owing to a technical error in the ordinance, no bids were received on Dec. 20 for paving West Jackson St. It is expected that new bids will be asked in January.

PEORIA, ILL.—The city engineer has prepared estimates for paving Second and Fourth Aves., with brick.

ALTON, ILL.—An ordinance has been introduced in council providing for the paving of William St. with vitrified brick. T. M. Long is City Engr., and Engr. Bd. Local Improvements.

SUPERIOR, WIS.—City is planning to ask for bids for considerable paving to be started in the spring. H. I. Russell is Secy. Street Com.

ST. PAUL, MINN.—Council has appropriated $50,000 for macadamizing University Ave., between this city and Minneapolis. The work will probably be started early in the spring.

The St. Paul Union Stock Yards Co. has awarded the contract for grading on their

property to DALE & BOMGARTNER, St. Paul. Estimated cost, $10,000. The company will lay tracks early in the spring, the entire improvement to cost $50,000 and be completed by June 1. Contract for the tracking will be let soon. M. D. Flower is Pres.

ATCHISON, KAN.—Fred. Giddings, City Engr., writes us that bids will probably be asked in February for paving Q and R Sts.

LITTLE ROCK, ARK.—Bids are asked until Jan. 10 for paving 18th St. W. A. Plunkett, Chn. Bd. Improvements.

SANTA FE, N. MEX.—Council has adopted measures for paving several important business streets and avenues.

SEATTLE, WASH.—Reports state that a macadamized trunk highway running from the British Columbia line through the states of Washington, Oregon and California to the borders of Mexico, is the undertaking planned by the King County Good Roads Association. Figures were submitted by Samuel Hill and Alfred Battle on the cost of construction of the proposed highways which was estimated at between $3,000 and $5,000 per mile.

SEATTLE, WASH.—Plans are being made for grading the entire Interbay district from 15th Ave. west. R. H. Thompson is City Engr.

BALLARD, WASH.—Harry T. Bostian, City Engr., has been instructed by the council to prepare a map and estimate of the cost of continuing the boulevard proposed by city of Seattle, which will run through Fremont and reach this city near A St.

STOCKTON, CAL.—A bond election will probably be called to vote on issuance of following bonds: Street improvement, $250,000; city hall, $140,000; sewers, $55,000; fire department, $80,000; water front, $110,000; parks, $75,000; garbage destroyer, $20,000; electric plant, $160,000. R. C. Tumelty is City Engr.

RIVERSIDE, CAL.—The Huntington Park Association is being formed with capital of $50,000 to construct a scenic road on Rubidoux Mountain. H. E. Huntington is interested.

BOISE, IDAHO.—City is contemplating the laying of about two miles of new pavement. Godfrey Sperling is City Engr.

PETERBOROUGH, ONT.—See under Water-Works.

MANUFACTURING PLANTS.

The names of parties awarded contracts are printed in capital letters.

LYNN, MASS.—Plans have been completed for a 4-story brick shoe factory for the Hurley estate. The building will be 50 × 82 ft. There will be five stores on the first floor. Henry W. Rogers, 38 Exchange St., Lynn, is Arch.

JERSEY CITY, N. J.—Plans have been prepared for a 2-story garage for Geo. E. Blakeslee on Boulevard Ave. John A. Resch, 170 Lexington Ave., Jersey City, is Arch.

NEWARK, N. J.—It is reported that the Pneumatic Ball Tire Co. has incorporated here with a capital stock of $3,000,000, for the purpose of erecting a plant to manufacture pneumatic ball tires. Frank H. McGowan is interested.

NEWARK, N. J.—The contract has been awarded to the AMERICAN CONCRETE-STEEL CO., of Newark, N. J., for the erection of a new steel foundry building, 160 × 210 ft., also a new producer house, 40 × 90 ft., and extension to present foundry building, 100 × 100 ft., by Benj. Atha & Co., of Newark, N. J. Cost about $80,000.

PHILADELPHIA, PA.—Plans have been completed for an addition to the mill at 22d St. and Allegheny Ave., for Pabst & Co. Chas. J. Brooke, 14 South Broad St., is Arch.

YORK, PA.—It is reported that the S. Morgan Smith Co. of this place will erect a new factory here for the manufacture of water wheels.

CONNELLSVILLE, PA.—The contract for the erection of new buildings, including machine shop, foundry, blacksmith and carpenter shops for the Connellsville Machine & Car Co. was awarded to the VAN DORN IRON WORKS CO., of Cleveland, O.

CUMBERLAND, MD.—Plans are in progress for a new 4-story building, 40 × 90 ft., for F. Blaul's Son to be equipped as a cold storage and refrigerating plant.

BALTIMORE, MD.—Bids have been taken for the construction of a 2-story building at 22 West Baltimore St. for the Central Realty Co. The building will be 22 × 152 ft., of brick, stone and terra cotta.

ALEXANDRIA, VA.—The Patent Hot Water Heating Co. has been incorporated for the purpose of manufacturing heating systems, furnaces and stoves. W. T. Offterdinger is Pres. H. Gardner is Secy.

ROANOKE, VA.—The Norfolk & Western Railway Co. has appropriated $1,000,000 for the enlarging of its car shops at this place.

GUSEMAN, W. VA.—The plant of the Englehardt Woolen Mills Co. will be rebuilt soon. Buildings will be of frame, covered with galvanized iron. Machinery not purchased.

ELKINS, W. VA.—Preliminary plans have been started for a factory building for the Nestor Piano & Organ Co. at this place. French Nestor, of Hendricks, W. Va., is interested.

WILMINGTON, N. C.—The Acme Hardwood Mfg. Co. has been organized here and will erect a factory for the manufacture of wagon poles, tongues, felloes, rungs, shafts and whiffle-trees. Electricity will be used for power. W. L. Stagg is Pres.

KINGS MOUNTAIN, N. C.—It is reported that C. M. Cooke, Jr., of Kings Mountain, will erect a new factory on a site between this place and Bessemer City, for the manufacture of lace-curtain yarns.

READERS' WANTS

Our readers, and others, who are in the market for supplies, machinery, etc., or to award contracts for work, will nearly always find the names of the firms who handle the material they want by referring to our advertising pages. Our advertisers are constantly changing their cards, and for this reason we advise our readers to look over the paper from the front cover to the back cover so as to keep in touch with up-to-date contractors' material, methods, etc. Mention Engineering News when writing our advertisers. If, however, you do not find advertised just what you want please write us at once and we will notify the proper firms without delay, and without charge.—Engineering News can help buyers.

BRICK MAKING MACHINERY.—Abingdon, Va.—Peirce Crockett is understood to be in the market for this machinery.

SEPTIC TANKS.—Youngstown, O.—Frank Hitchcock, Pres. Andrews & Hitchcock Iron Co., writes us for the names of makers of septic tanks.

CONCRETE MIXERS.—Dublin, Ga.—The Georgia Hydraulic Stone Co., Dublin, Ga., and J. C. Hurst & Co., Pulaski, Va., are reported in the market for mixers.

DREDGE.—Istachatta, Fla.—It is stated that the Istachatta Phosphate Co. is in the market for a 1¾-yd. dipper to work in 35 ft. of water.

CONVEYING MACHINERY. — Richmond, Va.—C. B. Ford Co., of Richmond, Va., and Southern Fuller's Earth Co., 763 Calvert Bldg., Baltimore, are reported in the market for belt conveyors, etc.

STARCH MACHINERY.—Texarkana, Ark.—L. C. Stubbins, Asst. Engr., Mo. Pac. Ry., Texarkana, writes us that he wishes data relating to the manufacture of starch from potatoes, and the machinery used.

FIRE SERVICE.—Stamford, Conn.—Paul Nash, Cy. Engr., writes us that he wants information regarding auxiliary high service tower or tank reservoir for fire service only. The cost of such systems, and where such towers are in operation is wanted.

TELEPHONE, ETC.—Dover, N. J.—Geo. E. Jenkins, C. E., writes us that he wants the names of firms who will bid on the construction and furnishing the instruments, etc., for a telephone line to be about two miles long.

AUTOMATIC WIRE CRIMPING MACHINE.—Washington, D. C.—Royce & Ricketts, Commercial Bank Bldg., writes us that they have an inquiry for the above machine, with automatic cut-off for grill and grating work, etc.

COLD STORAGE MACHINERY.—Birmingham, Ala.—The McClay-Jemison Co., 222 First National Bank Bldg., is reported in the market for machinery for a cold storage plant, and also by E. H. Bostwick & Son, of Whistler, Ala.

FIRE DEPARTMENT SUPPLIES.—Cape Girardeau, Mo.—Geo. E. Chappell, Cy. Clk., writes us that catalogues are wanted from manufacturers of fire department supplies, such as steam fire engines, rubber clothing, etc. Arthur Leber is Fire Chief, and W. H. Coerver is Mayor.

INDUSTRIAL RAILWAY, ETC.—Syracuse, Ind.—The Art Portland Cement Co. writes us that it is in the market for the above.

ELECTRICAL SUPPLIES, ETC.—It is stated that electrical supplies of various descriptions are wanted by the Silver Hardware Co., Keyser, W. Va.; the Rhea Co. Electric Light Co., of Dayton, Tenn.; the Houston Packing Co., Houston, Tex.; the Colorado Salt Co., Colorado, Tex.

BOILERS AND ENGINES.—It is stated that boilers and engines of various types, etc., are wanted by Burroughs & Mankin, 812 East Main St., Richmond, Va.; R. E. Edwards, Creston, S. C.; Rhea County Electric Light Co., Dayton, Tenn.; Southern Fuller's Earth Co., 763 Calvert Bldg., Baltimore, Md., and the Alamance Furniture Co., Mebane, N. C.

BUILDING MATERIALS, CEMENT, etc.—It is stated that building materials, such as cement, brick, etc., are wanted by C. W. Mackenzie, of El Paso, Tex.; Jas. J. White, 2031 Quinlan Ave., Birmingham, Ala.; Justice & Waldrop, of Rutherfordton, N. C.; J. C. Hurst & Co., Pulaski, Va.; John Bardon, of Fort Worth, Tex.; Yorke Furniture Co., of Concord, N. C.

SMALL SEWAGE DISPOSAL PLANT.—Youngstown, O.—H. M. Reel, C. E., 268 Custer Ave., Youngstown, writes us that he wants the latest information regarding the design and cost of small sewage disposal plants for single residences in small communities, which involve the use of a septic tank in combination with sub-surface contact or filter beds.

TIMBER, PILES, PORTLAND CEMENT, STRUCTURAL STEEL, GALVANIZED IRON PIPE, CABLEWAYS, PUMPS, BOILERS, HOISTING ENGINES, CONTRACTORS' SUPPLIES, ETC.—Evansville, Ind.—The Hollerback & May Contract Co., Evansville, writes us that it will probably be in the market about Jan. 15 for the following supplies and machinery for work to be done on the Ohio River, near McMechan, W. Va.: About 1,000,000 ft. timber in hemlock, oak, beech, sugar maple, yellow pine, etc.; about 3,000 round piles in lengths of 25 to 30 ft. of any wood which will stand hard driving, piles to be not less than 8 ins. at small end and 13 ins. at the butt; about 20,000 bbls. Portland cement; about 600 tons structural steel, castings, forgings, bolts and miscellaneous iron; about 5,000 lin. ft. 1½-in. and 32 galvanized iron pipe and cableway, pumps, boilers, hoisting engines, supplies, etc., used in contractors' work.

WAYCROSS, GA.—See under Railways—Atlantic Coast Line R. R.

NEWNAN, GA.—The Newnan Cotton Mills Co., of this city, has increased its capital stock by $500,000 for the purpose of erecting another large mill.

COLUMBUS, GA.—The contract for erecting the new building for the Columbus Coca-Cola Bottling Co. has been awarded to L. E. WOOTEN, of this city. T. F. Lockwood, of Columbus, is Arch.

SAVANNAH, GA.—Plans have been prepared for the new factory for the American Can Co., 11 Broadway, New York, N. Y., to be located in this city. H. W. Witcover, Savannah, Ga., is Arch. Cost, $100,000.

JACKSONVILLE, FLA.—The Florida Refining Co. of this city will erect two buildings for the refining of cocoanut oil and making brushes, matresses and various other articles from the shucks of the cocoanuts. J. T. Cox is Mgr.

BIRMINGHAM, ALA.—It is reported that several prominent business men of this city are interested in the establishing of a cold storage and refrigerating plant in this city.

LAUREL, MISS.—Bids are asked by the Laurel Cotton Mills Co., until Jan. 15, for the construction of a 2-story mill building, 75 × 160 ft.

LOCKPORT, LA.—It is reported that the Lafourche Packing & Ice Co. will erect a large plant here to carry on a general fish and vegetable canning business. Cost, $50,000.

NEW ORLEANS, LA.—It is reported that plans are completed for a new factory building for the Delta Bag Co., of New Orleans.

MEMPHIS, TENN.—It is reported that a new factory for making blank pearl buttons is under consideration here. Col. I. Peters, of the Memphis Industrial League, is interested.

Plans have been prepared for a storage warehouse for B. Lowenstein & Bro., at Fourth and Washington Sts. Alsup & Wood, 544 Rudolph Bldg., Memphis, are Archs. Cost, $85,000.

CHATTANOOGA, TENN.—It is reported that the Tennessee Realty & Warehouse Co. will erect three warehouses, each 30 × 140 ft.

NASHVILLE, TENN.—It is reported that a site has been secured by H. G. Lipscomb & Co. for the erection of a factory for the manufacture of hardware specialties. Also a large storage warehouse in addition.

CHATTANOOGA, TENN.—It is reported that the Forster Pulley Co., of Cuba, New York, will erect a plant here.

LOUISVILLE, KY.—It is reported that the Bradley-Gilbert Co. will erect a new printing and bookbinding establishment here.

WINCHESTER, KY.—It is reported that the Miller's Creek Lumber Co. will erect a planing mill here. W. C. Taylor, of Winchester, is interested.

EAST LIVERPOOL, O.—It is reported that the American Sewer Pipe Co. will rebuild its factory recently destroyed by fire.

CLEVELAND, O.—Plans have been completed for a carpet cleaning factory for D. O. Summers Carpet Cleaning Co., at East Prospect St. Geo. H. Smith, 29 Euclid Ave., is Arch.

CHAGRIN FALLS, O.—It is reported that extensive additions will be made to the plant of the Union Bag Co.

NEW RICHMOND, O.—It is reported that H. J. Scheid, of Marion, Ind., will erect a new woodworking factory here.

YOUNGSTOWN, O.—The Ohio Steel Furniture Co., of this city, will erect a plant here for the manufacture of desks and steel furniture. S. S. Conroy and James A. Murphy are members of the company.

LOGANSPORT, IND.—It is reported that H. E. Goldstein, of 341 North East St., Indianapolis, is planning to erect a large radiator factory here.

INDIANAPOLIS, IND.—The Cleveland, Cincinnati, Chicago & St. Louis Railroad Co. has secured a site in this city for the erection of large shops. M. E. Ingalls, of Cincinnati, O., is in charge.

GARRETT, IND.—It is reported that John Worth & Sons of this place will rebuild their flour mills recently destroyed by fire.

FT. WAYNE, IND.—THE FT. WAYNE CONSTRUCTION CO. has been awarded the contract to build a large power house for the Cincinnati Traction Co.

SHELBYVILLE, IND.—It is reported that the Vandergreft-Conger Wrench Co. will build a new factory here for the manufacture of wrenches.

FLINT, MICH.—Plans are nearing completion for a 3-story factory building at this place for the Weston-Mott Co., Utica, N. Y. Field, Hinchman & Smith, Washington Arcade, Detroit, Mich., are Archs.

BAY CITY, MICH.—It is reported that the Star Knitting Co. is having plans prepared for a new mill at this place. The building will be 54 × 180 ft., 3 stories and basement, with an addition, 50 × 50 ft. An isolated power plant, 30 × 50 ft., will be erected.

It is reported that the Bay City Knitting Co. will erect a new plant here.

CHICAGO, ILL.—It is reported that the Goss Printing Press Co. will erect a new building for the manufacture of printing presses and machinery.

It is reported that the furniture factory of S. Karpen & Bro., 187 Michigan Ave., will be rebuilt.

JOLIET, ILL.—The Joliet Bridge & Iron Co. of this city will erect an addition to its plant.

AURORA, ILL.—It is reported that the American Woodworking Machine Co. will erect a new addition to its present plant to be used as a machine shop.

MILWAUKEE, WIS.—It is reported that an immense drying plant will be erected here in connection with the Joseph Schlitz Brewing Co.'s plant.

MASON CITY, IA.—It is reported that this city is to have a new Portland cement plant, costing $1,200,000.

CLINTON, IA.—It is reported that L. Iten & Sons will erect a new factory building at Ash and Second Sts. Size, 100 × 200 ft.

RAPIDS CITY, S. DAK.—It is reported that L. A. Richards is contemplating the erection of a large flour mill at this place. Preliminary surveys have already been made.

BEAUMONT, TEX.—It is reported that the Texas Dynamite Co. of this city will erect a new factory here. T. Goodwin, of Marietta, Ohio, is interested.

HOUSTON, TEX.—The contract for the construction of a 4-story factory building and warehouse for the Houston Packing Co. was awarded to W. HUMPHREYVILLE.

SPOKANE, WASH.—It is reported that Thomas Olson will erect a new storage warehouse on Washington St.

WEST SEATTLE, WASH.—Extensive alterations and additions will be made to the shipbuilding plant of King & Winge at West Seattle.

PORTLAND, ORE.—The Centennial Milling Co., of this city, will erect a large plant on East Stark St. at a cost of $100,000.

CHICO, CAL.—The contract for the construction of the new sugar plant at this place was awarded to CARL LEONARDT, of Los Angeles, Cal. Cost, $1,000,000.

SALT LAKE CITY, UTAH.—It is reported that the erection of large car shops is proposed for this city by the Rio Grande Western and Western Pacific Railway Companies.

VANCOUVER, B. C.—The British Columbia Wire & Nail Co. will rebuild its plant recently destroyed by fire.

SHERBROOKE, QUE.—The Canadian Rand Drill Co. is contemplating the erection of a large addition to its plant.

ST. JEROME, QUE.—It is reported that Senator Mason, of New Haven, Conn., is interested in establishing a new pulp industry here.

WINGHAM, ONT.—The Canada Furniture Co., of this place, will erect a large addition to their plant.

MISCELLANEOUS CONTRACTS.

The names of parties awarded contracts are printed in capital letters.

LEVEE.—New Orleans, La.—M. MITCHELL, of New Orleans, has been awarded contract for rebuilding the levee of the Old Basin.

WHARVES.—Houston, Tex.—The International & Great Northern R. R. Co., it is reported, is having plans made for wharves on Buffalo Bayou, Houston.

DRAINAGE BONDS.—Fort Dodge, Ia.—Bids are asked until Jan. 17, 11 a. m., for purchase of $154,900 of county drainage bonds. H. S. Holm is County Audr.

DRAINAGE.—Pekin, Ill.—Bids are asked until Jan. 11, 2 p. m., for construction of a dredge ditch. Work consists of 45,120 cu. yds. of earth to be removed by dredge boat. Jesse Black, Jr., is Atty., at Pekin, Ill.

DRAIN.—Iowa City, Ia.—The date for opening bids for the proposed drain for Johnson County has been extended from Jan. 3 to Feb. 5. Specifications will be on file at office of Engineering News, New York.

DITCHES.—Cleveland, O.—Bids are asked until Jan. 13, 11 a. m., for construction of Dover ditches. Est. cost of the 33,260 cu. yds. of unclassified excavation is placed at $4,989. William H. Evers is County Surveyor; R. C. Wright is County Audr.

VESSEL.—Washington, D. C.—Bids are asked until noon, Jan. 24, for construction and delivery of single-screw steel steam light vessel No. 84. Rear-Admiral B. P. Lamberton, U. S. N., is Chn. Dept. Commerce and Labor, Light House Board.

DITCH.—Wapakoneta, O.—The commissioners of Auglaze County will advertise for bids about March 1 for excavating a ditch, 5 miles long, 6 ft. deep and 5 ft. wide at base; also for constructing a tile ditch, about 2 miles long, 12 to 18 ins. F. A. Runkle is County Engr.

WHARF REPAIRS.—Tampa, Fla.—It is reported that contract has been awarded to WM. H. VIRDEN, of Lewes, Del., at $14,957, for making repairs to the wharf, gangway, etc., of the Tampa Bay quarantine station. It is agreed that the work shall be completed by Aug. 1, 1906.

DITCH.—Alexandria, Minn.—Bids were received on Dec. 12 by E. P. Wright, County Audr., for construction of ditch No. 8. The contract for main ditch was awarded to JERRY SHERWOOD, of Litchfield, Minn., at $5,577, and contract for branches to JOHN GANGL, of Freeport, Minn., at $2,817.

CEMENT.—Nebraska.—The Secretary of the Interior has awarded a contract to and approved the bond of the PORTLAND CEMENT CO., of Denver, Colo., for furnishing 10,000 bbls., more or less, of Portland cement at $1.59 per bbl. f. o. b. cars Denver, for use in the North Platte project, Nebraska.

DRAINAGE DITCH.—Sioux City, Ia.—Bids are asked until Feb. 8 for construction of the Farmers' Drainage Ditch in Woodbury County. The work is divided into 20 sections. The total length is about 82 miles. There will be about 1,327,855 cu. yds. of excavation. L. F. Wakefield is Engr.-in-Charge, at Sioux City, Ia.

LOCK AND DAMS.—Dallas, Tex.—Bids are asked until noon, Feb. 15, for building lock and dams on Trinity River, Tex. Capt. W. P. Wooten, Engrs. (Advertised, Engineering News.)

DRAIN.—Boone, Ia.—Bids are asked by Archie Patterson, County Auditor, until 1 p. m., Jan. 14, for the construction of drain No. 18, as follows: Sect. one, 5,400 ft. of 22-in. tile; sect. two, 3,200 ft. of 18-in.; Sect. three, [illegible] ft. of 15-in.: Sect. four, 2,300 ft. of [illegible]; Sect. five, 1,350 ft. of 10-in. Bids for tile must be per 1,000 ft., f. o. b. Woodward, Ia.

PIER.—Muskegon, Mich.—McDONALD & BEAUVAIS, who were awarded the contract for the Holland pier work, have sublet the contract for the entire work to the BENNETT-SCHNORBACK CO., of Muskegon. The contract price is $150,000. The contract calls for 1,550 ft. of pier work, which is to be commenced by April 15, 1906, and to be finished in two years.

BULKHEAD, ETC.—Los Angeles, Cal.—Bids are asked until Jan. 8 for the following work either separately or as a whole at West Naples, Los Angeles County, Cal.: First, for construction of a wooden bulkhead about 17,000 ft. long; second, concrete facing for same; third, for excavation by dredging, etc., filling in, of approximately 500,000 cu. yds. of earth. V. J. Brown, 315 Stimson Blk., Los Angeles, Cal., is Engr.

SMELTING PLANT.—Ogden, Utah.—Bela Kadish, who will be general manager of the new smelting plant to be erected at Bonneville, in Boxelder County, about 12 miles from Ogden, by the Utah Smelting Co., is reported to be ready to place orders for material and equipment. The plant will handle about 200 tons of ore per day, but power facilities will be provided for a plant many times larger. There will be a sampling mill, and briquetting plant built in connection with the smelter.

DAM.—Boise, Idaho.—Bids are asked until 2 p. m., Feb. 1, at office of U. S. Reclamation Service, Boise, for construction of dam in Boise River. Main canal will be 27 miles in length, with two earthern embankments involving the placing of 1,950,000 cu. yds. of earth and gravel; 27,000 cu. yds. concrete masonry; excavating 1,400,000 cu. yds. earth; furnishing 60,000 lbs. steel; 162,000 lbs. cast iron and 450,000 ft. B. M. of lumber in connection with the Payette-Boise project, Idaho. Thos. Ryan, Acting Secy., Dept. of Interior. (Advertised, Engineering News.)

LEVEE.—New Orleans, La.—Bids were received on Dec. 26 by Capt. J. F. McIndoe, U. S. Engrs., for constructing levee. The bid of James R. Marlow, Point Coupee, La., was recommended for acceptance for the Waguespack levee, Secs. 1-4, 53,000 cu. yds., at $6,344. The bid of Hearin & Ryan, of Baton Rouge, La., was recommended on the following: Columbia levee, Secs. 1-6, 76,000 cu. yds., at $10,480; Waterford levee, Secs. 1-8, 105,000 cu. yds., at $12,001; Willswood levee, Secs. 1-2, 27,000 cu. yds., at $4,455. There were five bidders.

DAM.—Montana.—The Secretary of the Interior has rejected the two bids received in response to departmental advertisement for the construction of the lower Yellowstone dam in Montana. The grounds for rejection are that these bids are materially higher than the estimated cost plus a reasonable profit; that the bidders have already been awarded other contracts under the terms of the Reclamation Act and are not showing desirable progress in the work already in their hands. Authority is granted the Reclamation Service to readvertise the work after making slight modifications in the plans and specifications.

STEAMER REPAIRS.—Baltimore, Md.—THE BALTIMORE SHIPBUILDING & DRYDOCK CO., of Baltimore, Md., has received the award of a contract for repairing the German steamer "Regina," which was damaged by drifting on the British steamer "Claremont" at Teneriffe. The following were the bids: Marine Railway Engine & Boiler Works, $8,560 and 40 running days, or $11,216 and 30 running days and night work; McIntyre & Henderson, $8,600 and 18 running days, or $11,300 and 12 running days and night work; Baltimore Shipbuilding & Drydock Co., $7,456 and 16 running days, or $8,556 and 14 days and night work; Robins & Co., New York, $3,400 and 17 running days, or $3,900 and nine running days and night work.

TELEPHONE AND DISTRIBUTING SYSTEM.—Montana.—The Secretary of the Interior has awarded contracts for a distributing system and a telephone system in connection with the Huntley project, Montana. Contract for the telephone system, which includes 22 miles of pole line and circuit and two stations, was awarded to PIPER BROS. CO., of Pueblo, Colo., at a total of $6,790. Contract for Schedules 1, 2, 3, 4 and 5 of the distributing system was awarded to PIPER BROS. CO., at $116,600, and Schedule 6 to the NEW JERSEY FOUNDRY & MACHINE CO., of New York, for $10,388. The distributing system consists of a main canal, laterals and ditches and involves the excavation of 640,000 cu. yds. of earth, some rock excavation, and furnishing labor and material for structures requiring about 330,000 ft. B. M. of lumber, 140,000 lbs. of steel, and 1,400 cu. yds. of concrete.

SUPPLIES.—Washington, D. C.—Miscellaneous bids for naval supplies were opened Dec. 19 at the Bureau of Supplies and Accounts, Navy Dept. Lowest bid only is given. Those of especial interest to engineers are as follows: One standard safety worm-gear, belt-power elevator, Warner Elevator Co., Cincinnati, for delivery at Mare Island, Cal., $895; one double angle shear, motor-driven, for Mare Island, Cal., Henshaw, Buckley & Co., San Francisco, $2,163; one No. 4 Giant Keyseater, motor-driven, for Mare Island, Cal., Harron Rickard & McCone, San Francisco, $641; one electric-driven pipe threading and cutting machine for pipe and electric armored circuit, for Mare Island, Cal., Royce & Ricketts, Washington, D. C., $360; one motor generator set, complete with switch-board for Navy Yard, Washington, D. C., National Electrical Supply Co., Washington, D. C., $1,726; one boiler feed pump, for the Naval Academy, Annapolis, Md., A. S. Cameron Steam Pump Co., New York, $410; one feed water boiler for the Naval Academy, Annapolis, J. H. Leonard & Co., New York, $590.

NAVAL SUPPLIES.—Washington, D. C.—Bids were opened at the Bureau of Supplies and Accounts, Navy Dept., Dec. 26, for miscellaneous naval stores for the various bureaus of the department. Lowest bid alone is given. Those of interest to engineers are as follows: Two reversible wood boring machines for Mare Island, Ingersoll-Rand Co., 11 Broadway, New York, $140; one searchlight for Mare Island, Charles Jerome Boyne, 213 Centre St., New York, $470; two electrically driven steel plated exhaust fans for Portsmouth Navy Yard, Sprague Electric Co., 527 West 34th St., New York, $2,110; one screw machine, for League Island, Cleveland Automatic Machine Co., Cleveland, O., $1,050; one metal planing machine, for League Island, Vandyke, Churchill Co., 8 Dey St., New York, $2,625; one cold saw cutting off machine, for League Island, Vandyke, Churchill Co., $880; one engine lathe, for League Island, Vandyke, Churchill Co., $1,790; one 38-in. band saw, for Norfolk Navy Yard, J. W. Crieger Agency, Philadelphia, Pa., $350; one single frame steam hammer, for League Island, Drew Machinery Agency, Manchester, N. H., $742; one 40-in. motor driven metal sawing machine, New York, Railway Appliance Co., Old Colony Bldg., Chicago, $1,859; four steam windlasses, for League Island, American Ship Windlass Co., Providence, R. I., $2,100, Hyde Windlass Co., Bath, Me., $2,100; four piston air drills, for Boston Navy Yard, Independent Pneumatic Tool Co., 1255 First National Bank Bldg., Chicago, $969; for converting a square shaft 40-ton traveling crane into an electric traveling crane of same capacity, New York, Niles-Bement-Pond Co., 111 Broadway, New York, $4,490; two 200-KW. reversible motor generator sets, Norfolk, General Electric Co., Schenectady, N. Y., $9,610.

CONTRACT PRICES.

(Where (*) precedes items under Contract Prices the work was advertised in Engineering News.)

EXCAVATION.—Brooklyn, N. Y.—The Brooklyn Grade Crossing Commissioners, 44 Court St., Brooklyn, received bids on Dec. 12 for the Bay Ridge improvement contract on the Long Island R. R. Noted under Railways last week. The following is a tabulated statement of the bids opened: (1) McLoughlin Chapman Construction Co., 170 Broadway; (2) W. H. Gahagan, 189 Montague St., Brooklyn; (3) Uvalde Asphalt Paving Co., 1 Broadway; (4) Phoenix Construction Co., 41 Park Row; (5) Beinhauer & See, Gravesend Ave., Flatbush; (6) S. M. Green, Savings Bank Bldg., Jamaica; (7) Charles A. Sims & Co., Harrison Bldg., Philadelphia; (8) Ryan & Kelly, Pennsylvania Bldg., Philadelphia; (9) Charles Cranford, 38 Court St.; (10) Degnon Contracting Co., 21 Park Row; (11) H. S. Kerbaugh, Inc., Arcade Bldg., Philadelphia; (12) F. H. Clement & Co., Land Title Bldg., Philadelphia; (13) J. M. Murphy, 501 West 138th St.; (14) Ferguson Contracting Co., 60 Wall St.; (15) Ford & Waldo, 21 Park Row; (16) John F. Shields, 215 West 125th St.; (17) Latta & Terry, Pennsylvania Bldg., Philadelphia; (18) James H. Holmes, 127 Front St., New York; (19) James A. Hart, 256 Broadway; (20) J. G. White & Co., 49 Exchange Place; (21) Engineer's Estimate:

SEATTLE, WASH.—Bids were received on Dec. 2 by the Board of Public Works for the improvement of Prefontaine Pl. and other streets. The following are bids received: (a) Stirrat & Goertz, Inc., $125,925; (b) Barber Asphalt Paving Co., $107,577; (c) Bell & Price, $118,405; (d) Sparger Concrete Co., $117,879; (e) F. McLellan & Co., $112,935:

	(a)	(b)	(c)	(d)	(e)
Fixed estimate	$3,000.00	$3,000.00	$3,000.00	$3,000.00	$3,000.00
Clearing and grubbing, lump sum	1,000.00	800.00	1,000.00	800.00	500.00
12,000 cu. yds. earthwork	.40	.25	.40	.40	.27
300 lin. ft. 6-in. pipe sewer	1.10	.69	1.50	1.20	.40
510 lin. ft. 10-in. pipe sewer	1.35	1.00	1.50	1.60	1.00
900 lin. ft. 12-in. pipe sewer	1.75	1.75	2.50	1.75	1.50
10 manholes to be adjusted	30.00	10.00	20.00	30.00	15.00
10 4½-ft. manholes	55.00	50.00	70.00	50.00	65.00
22 catch basins, single inlets	60.00	55.00	60.00	50.00	50.00
11 catch basins, double inlets	70.00	65.00	70.00	60.00	60.00
3 catch basins, rebuilt	35.00	25.00	30.00	25.00	25.00
3 inlets to be moved	10.00	5.00	8.00	5.00	10.00
2 single inlets	25.00	15.00	25.00	10.00	15.00
11,350 lin. ft. curb, straight, granite	1.45	1.10	1.33	1.40	1.27
800 lin. ft. curb, curved, granite	1.75	1.25	1.55	1.60	1.27
500 lin. ft. curb reset	.45	.25	.50	.50	.40
10,000 lin. ft. sub-drains	.07	.08	.12½	.10	.15
14,600 sq. yds. brick pavement	2.40	2.10	2.23	2.25	2.22
10,850 sq. yds. sandstone	3.30	2.95	2.90	2.95	2.87
200 sq. yds. brick	1.40	1.00	1.50	1.30	1.22
425 sq. yds. brick, alley crossings	2.40	2.00	2.35	2.15	2.22
800 lin. ft. wooden stops	.50	.40	.50	.40	.50
25,450 sq. yds. gravel base	.15	.10	.12½	.14	.10
2,920 lin. ft. 12-in c i pipe Class A	2.35	2.08	2.25	2.10	2.49
1,250 lin. ft. 12-in c i pipe Class B	2.75	2.49	2.50	2.55	2.50
320 lin. ft. 6-in. c. i. pipe, Class B	1.20	1.04	1.20	1.10	1.00
30 lin ft. 8-in c. i. pipe, Class B	1.60	1.40	1.70	1.40	1.00
16 12-in. gates	50.00	40.00	45.00	45.00	50.00
4 6-in gates	18.00	18.00	25.00	25.00	20.00
14 gates, removed, reset	10.00	10.00	10.00	10.00	10.00
34 brick gate chambers	35.00	30.00	35.00	40.00	45.00
22 hydrants, as specified	65.00	65.00	65.00	70.00	70.00
11 hydrants, reset	12.00	20.00	10.00	5.00	15.00
430 lin. ft. 6-in. c. i. pipe, Class B	1.20	1.10	1.20	1.10	1.00
120 lin. ft. 6-in. c. i. pipe, Class A	1.00	1.00	1.00	1.00	1.00
600 lin. ft. 1-in. galv. iron pipe	.50	.30	.40	.25	.25
15 monument cases	7.00	8.00	10.00	6.00	10.00
60 sq. yds. concrete	1.25	1.00	1.20	1.20	1.00
25 M. ft. B. M. new lumber	13.00	15.00	16.00	16.00	10.00
25 M. ft. B. M. old lmbr, relaid	5.00	1.50	6.00	4.00	4.00
100 M. ft. B. M. old plnkg, relaid	2.00	1.00	5.00	4.00	4.00
	$125.925	$107,577	$118,405	$117,879	$112,935

*DREDGING.—Richmond, Va.—Bids were received on Dec. 22 for dredging, removing rock, and constructing and repaving jetties in James River, Va., by Lt.-Col. R. L. Hoxie, U. S. Engrs., as follows: (1) P. Sanford Ross, Inc., 277 Washington St., Jersey City, N. J.; (2) Coastwise Dredging Co., Norfolk, Va.; (3) The Degnon Contracting Co., 13 Park Row Bldg., New York. For earth excavation, 103,461 cu. yds., more or less, per cu. yd.: (1) 27½c., (2) 28c., (3) 32½c.; total: (1) $29,277, (2) $29,809, (3) $34,560. For hard rock excavation, 20,178 cu. yds., more or less, per cu. yd.: (1) $5.90, (2) $5.94, (3) $7.50; total: (1) $119,050, (2) $119,857, (3) $151,335. For conveying excavated material from scows to points of deposit as specified, 60,000 cu. yds., more or less, per cu. yd.: (1) 18c., (2) 24c., (3) 25c.; total: (1) $10,800, (2) $14,400, (3) $15,000. For transporting excavated material on deck scows below Jetty 434, as specified, 1,000 cu. yds., more or less, per cu. yd.: (1) 10c., (2) 9c., (3) 20c.; total: (1) $100, (2) $90, (3) 200. For transporting excavated material on dump scows to vicinity of Jordan's Point, 60,000 cu. yds., more or less, per cu. yd.: (1) 17½c., (2) 15c., (3) 15c.; total: (1) $10,500, (2) $9,000, (3) $9,000. For round pine tiles, 10 to 30 ft. long, 4,259 lin. ft., per lin. ft.: (1) 35c., (2) 35c., (3) 20c.; total: (1) $1,490, (2) $1,490, (3) $831. For round oak piles, 25 to 35 ft. long, 530 lin. ft., per lin. ft.: (1) 50c., (2) 50c., (3) 25c.; total: (1) $265, (2) $265, (3) $132. For white oak wales, in place, 15,596 ft. B.M., more or less, per M ft., B.M.: (1) $50, (2) $50, (3) $85; total: (1) $780, (2) $780, (3) $1,326. For white oak string pieces, in place, 2,833 ft., B. M., per M ft., B. M.: (1) $50, (2) $50, (3) $85; total: (1) $142, (2) $142, (3) $241. For merchantable pine sheet piling, 75,888 ft. B. M., in place, per M ft., B. M.: (1) $39, (2) $39, (3) $65; total: (1) $2,960, (2) $2,960, (3) $4,933. Total of whole proposal: (1) $175,364, (2) $178,793, (3) $217,618.

U. S. POSSESSIONS AND CUBA.

The names of parties awarded contracts are printed in capital letters.

COPPER WIRE, ETC.—Panama.—Bids are asked until 2 p. m., Jan. 8, for furnishing copper wire, cable and electrical material at office of Alfred Anderson, Assistant Pur. Agt., Panama R. R. Co., 24 State St., New York.

CROSS TIES.—Panama.—The bids opened on Dec. 14, at the Isthmian Canal Commission for 200,000 cypress hewn cross ties, or less, of various sizes, have been rejected and an advertisement will be re-issued shortly for the same order.

GANTRY CRANE.—Panama.—The Isthmian Canal Commission has extended the time for opening bids for gantry crane and iron roof, noted in Engineering News on Dec. 28, from Jan. 2, at 10.30 a. m., to Jan. 12, at the same hour.

BIDS RECEIVED DEC. 12, 1905, FOR THE BAY RIDGE IMPROVEMENT CONTRACT ON THE LONG ISLAND RAILROAD.

	(1)	(2)	(3)	(4)	(5)	(6)	(7)
Cu. yds. No. 1 Concrete	$5.65	$6.60	$6.50	$7.25	$6.25	$6.80	$7.40
200 " " 2 "	5.50	6.30	6.20	7.00	6.00	6.95	6.75
14,500 " " 3 "	5.35	6.00	5.80	6.75	5.85	5.90	6.65
300 " " 4 "	5.20	5.90	5.70	6.50	5.50	5.75	6.50
" " 5 "	5.10	5.60	5.50	6.25	5.50	5.70	6.25
600,000 cu. yds. excavation in embankment	.33	.32	.35	.319	.34½	.39	.39
400,000 " " on cars, M. B. Junct	.28	.30	.30	.303	.33	.32	.37
20,000 " foundation excavation	.65	.90	.65	1.50	.98	.69	.75
lin. ft. 12-in. sewer pipe	.60	.60	.75	.50	.44	.65	.95
" 15-in. "	.75	1.00	1.00	.65	.56	.96	1.25
" 18-in. "	.95	1.20	1.50	.80	.71	1.25	1.50
1,000 " 24-in. "	1.75	1.75	2.00	1.25	1.42	2.40	2.25
Force Account Extra	Cost + 15%	Cost + 10%	Cost + 15%	Cost + 15%	Cost + 15%	Cost + 10%	Cost + 10%
Total	$404,985	$421,780	$432,050	$445,075	$447,695	$466,805	$498,975
Date for completion of work	(*)	18 months	Nov. 1, 1907	Jan. 1, 1908	Dec. 30, 1903	18 months	Dec. 12, 1907

*Sept. 1, '07, or 10 months after commencing work on Section 2.

	(8)	(9)	(10)	(11)	(12)	(13)	(14)
Cu. yds. No. 1 Concrete	$6.75	$6.63	$7.50	$6.16	$7.00	$8.04	$9.00
200 " " 2 "	6.50	6.53	7.05	6.15	6.86	7.25	9.00
14,500 " " 3 "	6.25	6.23	6.55	5.89	6.00	7.25	6.50
300 " " 4 "	6.00	6.06	6.45	5.81	5.80	7.12	6.25
" " 5 "	5.75	5.97	6.00	5.63	5.50	6.84	6.00
600,000 " excavation in embankment	.41	.41¼	.38½	.49	.45	.42	.49
400,000 " " on Cars, M. B. Junct	.39	.39	.38½	.29	.37	.40	.40
20,000 " foundation excavation	.75	.65	1.50	.85	.65	.80	2.00
lin. ft. 12-in. sewer pipe	.40	.46	.60	.40	.25	.66	.75
" 15-in. "	.55	.62	1.00	.54	.75	.82	1.25
" 18-in. "	.72	.80	1.25	.68	1.00	1.00	2.00
1,000 " 24-in. "	1.35	1.40	2.00	1.30	1.30	1.60	3.00
Force Account, Extra	Cost + 10%	Cost + 15%	Cost + 10%	Cost + 15%	Cost + 12½%	Cost + 10%	Cost + 10%
Total	$512,075	$512,859	$515,320	$516,678	$522,400	$538,311	$594,925
Date for completion of work	18 months	July 1, '07	June 1, '07	Dec. 13, '06	June 1, '07	Aug. 31, '07	One year

	(15)	(16)	(17)	(18)	(19)	(20)	(21)
Cu. yds. No. 1 Concrete	$6.85	$5.98	$6.75	$6.69	$8.00	$7.50	
200 " " 2 "	6.60	5.95	6.55	6.49	7.75	7.00	
14,500 " " 3 "	6.30	5.92	6.10	6.25	6.50	6.50	$6.00
300 " " 4 "	6.25	5.90	6.05	6.21	6.40	6.50	
" " 5 "	5.95	5.50	5.95	5.97	6.30	6.25	
600,000 " excavation in embankment	.56	.53¼	.56	.71	.70	.84	.40
400,000 " " on Cars, M. B. Junct	.43	.49	.55	.59	.65	.79	.31
20,000 " foundation excavation	.70	.75	.84	1.67	1.00	1.50	.75
lin. ft. 12-in. sewer pipe	.47	.45	.55	.53	.50	.50	
" 15-in. "	.64	.65	.65	.85	.75	.80	
" 18-in. "	.78	.78	.95	.97	1.15	1.00	
1,000 " 24-in. "	1.45	1.70	1.50	1.60	1.75	1.85	1.00
Force Account, Extra	Cost + 10%	Cost + 10%	Cost + 10%	Cost + 15%	Cost + 15%	Cost + 15%	
Total	$617,995	$622,500	$755,875	$790,786	$799,470	$949,450	$470,000
Date for completion of work	Dec. 1, '07	July 30, '07	June 30, '07	Dec. 31, '08	July 1, '08	Dec. 30, '07	

NAVAL SUPPLIES.—Cuba.—Bids are asked until Jan. 16, 10 p. m., for furnishing a quantity of lavatories, etc., gasoline, iron pipes and fittings, vitrified sewer pipe, etc., at Guantanamo Bay naval station, Cuba. H. T. B. Harris, Paymaster Gen. U. S. N., Washington, D. C.

BUILDINGS, WHARVES. — Cuba. — President Estrada Palma has stated that a decision has been reached to expend from $1,000,000 to $1,500,000 in reconstruction of certain customs-houses in ports of the Republic and improvement of customs wharves. The Insular Ry. Co. has been authorized to build a wharf at the Bay of Atares, Havana.

FOREIGN CONTRACTS.

(To insure prompt attention, letters upon consular business should be addressed to the American Consul at ———, ———. Such letters are opened and attended to by the person who happens to be in charge of the office. If addressed to the consul by name they are forwarded to him unopened if he should be absent, and a delay thus intervenes; if he should in the meantime have gone out of office they may wholly escape attention.)

INGOTS AND BAR SPELTER.—Italy. Bids are asked until 11 a. m., Jan. 8, for ingots and bar spelter to value of 87,325 lire ($16,855), for the Royal Arsenals at Naples, Spezia, Venice and Toranto. The final date for improving on the price of the provisional adjudication will expire on Jan. 30, 1906.

WARSHIPS.—France.—In a recent newspaper interview, M. Thomson, Minister of Marine, stated that at the next session of Parliament the government would ask a credit for the construction of three ironclads, each to be of 18,000 tons and to have a speed of 19 knots. This, he said, would be followed by a similar demand at the following session.

BREAKWATERS, ETC.—Egypt.—Bids are asked until Feb. 10, noon, for the construction of two breakwaters and the supply of concrete blocks, at the office of the Chief Port Engineer, Alexandria. Bids should be addressed in double envelopes, the outer to "M. le Directeur-Generale des Ports et Phares," Alexandria, and the inner inscribed "Offre pour la construction de deux brise-lames et pour la fourniture de blocs artificiels."

DOCK.—Hongkong, China.—A contract for three patent slipways to be laid down at Hongkong has been placed with S. & H. MORTON & CO., of Leith, Scotland. One of these slipways is to be capable of taking up vessels 400 ft. long by 40 ft. beam and of 2,700 tons weight. The other two are for vessels 290 ft. in length by 50 ft. beam and weighing 2,000 tons. All are to be driven by electric power. The patent slipways are designed for the new dock which Butterfield & Swire are building at Quarry Bay.

RAILROAD.—Australia.—James Stewart & Co., Pittsburg, Pa., have been employed to make a survey for a new railroad to be built on the northern coast of Australia, by Boston, New York and London capitalists. The same concern will probably secure the contract for building the railroad, which will be 120 miles long. The work will cost between $3,000,000 and $4,000,000. The projected railroad will extend between Lilleyda and Burketown, in Australia. It is reported here that the firm of J. Pierpont Morgan & Co., New York, is interested in the venture.

The LACKAWANNA STEEL CO., of Buffalo, N. Y., has an order for shipment of 6,000 tons of steel rails to Sydney for the New South Wales government.

STEEL PIPE.—Natal.—Bids are asked until Jan. 15 by the Corporation of Durban, Natal, for the supply and delivery "free on board" (and alternatively for delivery c.i.f. Durban) of six miles of 30-in. mild steel pipes, weighing, approximately, 1,500 tons. Three miles of pipes are to be delivered at Durban not later than June 30, 1906, and the remaining three miles to be delivered not later than Nov. 30, 1906. General conditions, specification and bill of quantities, with form of tender, can be obtained from M. W. H. Radford, C.E., Albion Chambers, Nottingham, England, Consult. and Representative Engr. to the Corporation, on deposit of $15, which will be returned on receipt of a bonafide tender. Sealed and endorsed bids are to be delivered to the agents to the Durban Corporation, M. Webster, Steel & Co., 5 East India Ave., Leadenhall St., E.C.

PUBLIC IMPROVEMENTS. — Germany.—Richard Guenther, American Consul at Frankfort, Germany, reports that the following municipalities in Germany have recently negotiated or issued loans for purposes of public improvements: Düsseldorf, 10,000,000 marks ($2,380,000), Charlottenburg, 26,000,000 marks ($6,188,000), Frankfort-on-the-Main, 1,014,000 marks ($241,332). A central electric plant is projected for lighting the towns and villages of the Buedingen district and of the valley of the Nidda. Mainz plans the erection of a plant for incinerating garbage and rubbish. Chemnitz will spend 140,000 marks ($33,320) for a cremation plant. Coburn also plans the building of a crematory. The American Consuls at these cities are: Düsseldorf, Peter Lieper; Charlottenburg, A. M. Thackera (at Berlin); Mainz, Walter Schumann; Chemnitz, Ernest L. Harris; Coburg, F. D. Langenheim.

INDUSTRIAL NOTES.

THE HUB MACHINE & TOOL CO., Inc., has removed to 621 Cherry St., Philadelphia.

TOCH BROS., paint manufacturers, have removed to 320 Fifth Ave., New York.

SCHWENCKE, KIRK & CO., draftsmen's supplies, etc., have removed to the Glackner Bld., 227 Fulton St., New York.

L. & C. HARDTMUTH state that they intend to remove the New York offices from their present location in Barclay St. to new quarters at No. 34 East 23d St.

WILLIAMS, BROWN & EARLE, 916 Chestnut St., Philadelphia, have announced that it has purchased the retail stock and business of Queen & Co., Inc., in optical, photographic and microscopical supplies, etc.

Situations Wanted

Received too late for pages 32 and 33. Copy should be received by Tuesday a. m.

Mechanical and Electrical Engineers.

MECHANICAL ENGINEER (1901), with good experience in steam plants, colliery and cement mill construction, open for engagement after Feb. 1. Address "C. A. 1," Engineering News, New York. 1-1t

Civil Engineers.

YOUNG CIVIL ENGINEER, with some experience on surveying, concrete and sewer work, desires position in the line of railroad or municipal engineering; will go anywhere, West or South preferred. G. Y., 235 E. 25th St., New York. 1-2t

GRADUATE CIVIL AND ARCHITECTURAL ENGINEER, with 14 years' practical experience, desires change about Jan. 1; first-class designer, calculator, estimator and superintendent; especially for plain and reinforced concrete construction, fireproofings, concrete building blocks, steel-concrete chimneys, grain elevators, tanks, dams, reservoirs, bridges, buildings, steel sheet and concrete pilings, etc.; first-class references. Address "L. A. 25," Engineering News, New York. 1-1t

CIVIL ENGINEER.—Graduate wants position on general construction work, experience with building contractor and as instrumentman with street railway company. Change necessary because of shutting down of present work. Best references. Address "F. 26," Engineering News, New York. 1-2t

COOPER UNION fourth year student desires position at any thing, with civil engineering concern; office or field work. Address "S. 1," Engineering News, New York. 1-1t

SOUTHERN WORK.—Temporary, by civil engineer, 7 years' experience, hydraulic and general engineering. Technical education. Address "O. 1," Engineering News, New York. 1-2t

Bridge and Structural Engineers.

STRUCTURAL ENGINEER is open for an engagement; 15 years' experience, last 12 in executive positions; expert designer, estimator and superintendent of steel and iron work for N. Y. city buildings, roofs, trusses, factory plants, &c.; thoroughly familiar with costs of materials and finished jobs; would like to engage with concern that will pay good salary for good results. Address "D. A. 1," Engineering News, New York. 1-1t

STRUCTURAL ENGINEER.—Technical education, and several years' experience detailing and estimating bridge, structural iron and plate work, also some experience selling, seeks position. Address "D 26," Engineering News, New York. 1-1t

ENGINEER, experienced on coal handling machinery and coal mining; also general construction work, now in charge of designing and estimating with general contractor, desires to secure position of responsibility. Address "K. 1," Engineering News, New York. 1-12t

BRIDGE (contracting) ENGINEER *holding* trade in desirable territory; south of Pennsylvania; at liberty to make arrangements with manufacturer; salary or division of profit basis. Address "X. 1," Engineering News, New York. 1-3t

Draftsmen.

STRUCTURAL DRAFTSMAN.—Three years' experience in detailing; I. C. S. graduate; age, 25; American. Address "Z. 1," Engineering News, New York. 1-1t

DRAFTSMAN.—Graduate, shop experience, 2½ years steel drafting, wants position as structural steel draftsman. Address "W. 1," Engineering News, New York. 1-1t

STRUCTURAL DRAFTSMAN.—Open for engagement; good experienced detailer and checker; can furnish excellent references. Address "P. 1," Engineering News, New York. 1-1t

MECHANICAL DRAFTSMAN; university graduate, with two years' practical experience in workshop and foundry and two and a half years in drawing office, strong in mathematics, mechanics and thermodynamics is open to accept a position with steam or water turbine or gas engine manufacturer. Address "I. 1," Engineering News, New York. 1-1t

Surveyors.

YOUNG MAN wants position as rodman who is high school graduate, having had six months' experience in railway construction. Also has taken I. C. S. course in engineering. Can do field or office work, and will give references. Address BOX 466, Normal, Illinois. 1-1t

STUDENT (surveying) wants position as chainman. BECKER, 774 Herkimer St., Brooklyn, N. Y. 1-1t

Superintendents, Misc., etc.

SUPERINTENDENT. — Engineering education; age, 36; experienced in cofferdams, pier work, dry docks, foundation and general contracting. Address BOX 1042, Ashtabula, Ohio. 1-4t

Situations Open

WANTED.—Engineer to design reinforced concrete construction for buildings; must be under thirty and a university graduate. Splendid opportunity for the right man with a company controlling a well-established system in the New England States. Address "F. A. 1," Engineering News, New York. 1-1t

WANTED.—Shop foreman for architectural and structural iron work. Address "FOREMAN," Box 2575, Boston, Mass. 1-1t

WANTED.—Young graduate engineer to act at present as timekeeper on large reinforced concrete work; to be transferred later to engineering force. TURNER CONSTRUCTION CO., 11 Broadway, New York. 1-1t

WANTED.—Engineer, age 25 to 40, experienced on stadia topography and land line work in timber. At least a year's work and liberal pay to right party. WM. G. FARGO, Jackson, Mich. 1-2t

WANTED.—Young man with technical education for village and country surveying. X. Y. Z., General Delivery, Flushing, L. I. 1-1t

WANTED.—Young man with technical training to act as health inspector for Englewood, N. J. Apply WM. C. TUCKER, 156 Fifth Ave., 9 to 10.30. 1-1t

Miscellaneous Wants

CAPITAL WANTED for a first-class engineering enterprise. Address "R. 1," Engineering News, New York. 1-1t

MINING AND CIVIL ENGINEER desires to correspond with an engineering firm with a view to enter partnership. Graduate mining engineer with practical experience at underground mining, assaying, milling, railway location and maintenance work. Can examine and report on mining property. Address "A. A. 1," Engineering News, New York. 1-10t

BRIDGE ENGINEER offers services preparing plans, etc., for steel construction. Address "L. 1," Engineering News, New York. 1-2t

WANTED.—Second-hand steam pump. Capacity 30 gallons per minute. Pressure per square inch 1,000 to 1,200 pounds. Prefer renting. Address "M. 1," Engineering News, New York. 1-1t

CHIEF DRAFTSMAN WANTED, capable of handling the drafting room of an electric, steam and general machinery manufacturing company. Product one million dollars per annum. Only those of adequate experience and marked executive ability should apply. Address "E. A. 1," Engineering News, New York. 1-1t

WANTED

One Stiff Leg Derrick

Fifty-foot boom and bull wheel; one 20-h. p. hoisting engine; one ¾-yd. orange peel bucket; one 25-35-h.p. traction engine; three cars for same; six bottom dumping wagons. Address,

1-1t HINMAN & SPROUL, Newton, N. J.

Manufacturing Plant

NEAPEL, ITALY

Graduate Civil Engineer with wide experience, seeks connections for the purpose of erecting in Neapel, Italy, a manufacturing plant for BRIDGE and STRUCTURAL IRON WORK and EQUIPMENTS for RAILWAYS. Address, "B A 1," Engineering News, New York. 1-4t

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